Environment Canada Environnement Canada

Sediment Data

Ontario

Données sur les sédiments

1987

INLAND WATERS DIRECTORATE
WATER RESOURCES BRANCH
WATER SURVEY OF CANADA
OTTAWA, CANADA, 1989

DIRECTION GÉNÉRALE DES EAUX INTÉRIEURES
DIRECTION DES RESSOURCES EN EAU
DIVISION DES RELEVÉS HYDROLOGIQUES DU CANADA
OTTAWA, CANADA, 1989

Published by authority of
the Minister of the Environment

Publié avec l'autorisation
du ministre de l'Environnement

© Minister of Supply and Services Canada 1989

Cat. No. En 36-410/2-1987

ISBN 0-662-56529-7

© Ministre des Approvisionnements et Services Canada 1989

N° de cat. En 36-410/2-1987

ISBN 0-662-56520-5

PREFACE

This publication was prepared by personnel of the Sediment Survey Section, Water Survey of Canada Division, under the direction of the Director, Water Resources Branch, Department of the Environment, Ottawa.

The basic data were collected and compiled under the supervision of the Regional Chief of the Water Resources Branch at Guelph, Ontario.

The co-operation received from provincial agencies and from other organizations is gratefully acknowledged.

PRÉFACE

Le groupe d'étude des sédiments de la Division des relevés hydrologiques du Canada, sous l'autorité du directeur des Ressources en eau du ministère de l'Environnement, à Ottawa, a préparé la présente publication.

Le chef régional de la Direction des ressources en eau, à Guelph (Ontario), a supervisé la collecte et la compilation des données de base.

Nous remercions vivement les organismes provinciaux, ou autres, pour leur collaboration.

TABLE OF CONTENTS

	PAGE
Preface	iii
Introduction	iv
Scope of Publication	v
History and Objectives of Sediment Surveys in Canada	v
Publication of Sediment Data	v
Collection and Processing of Basic Data	vii
Equipment and Instrumentation	vii
Hydrometric Surveys	vii
Sediment Sampling Program	vii
Total Sediment Load	ix
Sediment Survey Laboratories	ix
Accuracy and Reliability of Field Data and Computed Results	x
Method of Tabulation of Sediment Data	xi
Definition of Terms	xiv
Definition of Symbols	xvi
Microfiche	xvii
Equivalents of Measure	xviii
Co-operation and Acknowledgments	xix
Revisions	xix
Sediment Data Stations in Alphabetical Order	1
Station Number Index	49
Alphabetical Index	51

INTRODUCTION

The Water Resources Branch of the Department of the Environment herein presents for the 1987 calendar year the annual suspended sediment data and a historical data summary for the sediment survey investigations conducted in Ontario by the Water Survey of Canada.

Data on the character and quantity of fluvial sediments provided by sediment survey investigations are intended for use in studies of water quality, environmental impacts, river processes and behaviour, and engineering design.

General introductory information on the sediment survey is included in this publication. Similar information for the associated hydrometric survey is given in the regular publications containing surface water data.

Details on individual stations and related records, as well as recent data that have not yet been published, may be obtained upon application to:

Water Resources Branch,
Department of the Environment,
Federal Building,
75 Farquhar Street,
Guelph, Ontario.
N1H 3N4
(519 821-0110)

or to the Water Resources Branch, Department of the Environment, Ottawa, Ontario, K1A 0H3 (819 997-2098).

TABLE DES MATIÈRES

	PAGE
Préface	iii
Introduction	iv
Portée de la publication	v
Historique et objectifs des études des sédiments au Canada	v
Publication des données sur sédiments	v
Collecte et traitement des données de base	vii
Matériel	vii
Relevés hydrométriques	vii
Échantillonnage des sédiments des cours d'eau	vii
Débit solide total	ix
Laboratoires d'analyse	ix
Exactitude des données et des résultats	x
Présentation des tableaux de données sur les sédiments	xi
Définition des termes	xiv
Définition des symboles	xvi
Microfiche	xvii
Équivalences des unités de mesure	xviii
Coopération et remerciements	xix
Révisions	xix
Stations de relevé des sédiments par ordre alphabétique	1
Index numérique des stations	49
Index alphabétique	51

INTRODUCTION

Dans la présente publication de la Direction des ressources en eau du ministère de l'Environnement, on trouvera les données annuelles sur les sédiments en suspension pour 1987 et le sommaire des données chronologiques sur les sédiments, à la suite des études effectuées dans les cours d'eau de l'Ontario par la Division des relevés hydrologiques du Canada.

Les données recueillies sur la nature et l'importance de la charge solide dans les cours d'eau doivent servir aux études portant sur la qualité des eaux, les incidences environnementales, les processus fluviaux, le comportement des cours d'eau et la conception de projets.

La presente publication contient des renseignements généraux préliminaires sur les études des sédiments. Des renseignements semblables sur les études hydrométriques connexes sont contenus dans les publications régulières présentant des données sur les eaux de surface.

On peut obtenir des renseignements supplémentaires sur les stations et les relevés, ainsi que des données récentes non encore publiées, en s'adressant au:

Direction des ressources en eau
Ministère de l'Environnement
Édifice fédéral
75, rue Farquhar
Guelph (Ontario)
N1H 3N4
(519 821-0110)

ou au Direction des ressources en eau, ministère de l'Environnement, Ottawa (Ontario), K1A 0H3 (819 997-2098).

SCOPE OF PUBLICATION

Descriptive information about sediment stations is given. This refers to the Location, Latitude and Longitude, Drainage Area and whether the flow is Natural Flow or Regulated Flow (the year that regulation began is given, if known), Type of Gauge and the Total Suspended Sediment Load in Tonnes for the Period of Record is also included. International Gauging Stations are identified and the names of co-operating agencies who supply data are given; unusual conditions at the sediment station that could affect the data results are explained under "Remarks".

This publication contains data on streamflow, instantaneous suspended sediment concentration; daily mean suspended sediment concentration; daily suspended sediment loads; dissolved solids concentration; load summary; particle-size distribution of suspended sediment in percent sand, silt and clay; bed load and bed material; water temperature when samples were collected; type of sampler and the single sampling vertical location.

A historical sediment data summary includes such information as Sampled Concentration Maximum and Minimum; Suspended Sediment Load Maximum Daily and the Total for Period. The Period of Record and the Type of Operation for each year of data are also given. A Summary for the Months of record gives the Period of Record Mean, the Mean for Period of Record and the Standard Error of Mean as a percent.

HISTORY AND OBJECTIVES OF SEDIMENT SURVEYS IN CANADA

In Canada, investigations of sediment transported by streams were first undertaken by individual organizations or agencies in 1948, to meet the needs of federal and provincial agencies for assessment of particular projects. Although the investigations were extended to meet expanding needs after 1948, it was not until 1961 that a systematic survey was undertaken by the Water Resources Branch.

The sediment survey program has the following objectives:

(1) Collection and provision of data related to sediment transport in Canadian rivers for applications in water resource engineering, water quality and environmental studies.

(2) Provision of information and advice related to sediment transport.

(3) Assessment, improvement and standardization of equipment and techniques used in Canada's sediment survey program.

PUBLICATION OF SEDIMENT DATA

Sediment data have been published in a variety of formats since the beginning of the Sediment Survey Program.

PORTÉE DE LA PUBLICATION

Des données descriptives sont présentées sur les stations d'étude des sédiments. Elles concernent leur emplacement, leurs latitude et longitude, leur bassin versant, la nature de débit (naturel ou régularisé, avec indication, le cas échéant, de l'année où la régularisation a commencé, si elle est connue), le type d'instrument de mesure employé et le débit total des sédiments en suspension (en tonnes) pour la période de relevé. Les stations internationales de jaugeage sont indiquées, ainsi que le nom des organismes qui fournissent les données. Des explications concernant des conditions exceptionnelles qui ont pu influer sur les résultats sont présentées dans la partie «Remarques».

Cette publication renferme des données sur le débit des cours d'eau, les concentrations instantanées de sédiments en suspension, les concentrations journalières moyennes de sédiments en suspension, les débits journaliers de sédiments en suspension, les concentrations de matières dissoutes, les débits solides totaux (résumés), la granulométrie des sédiments en suspension exprimée en pourcentage de sable, de limon et d'argile, le charriage et les matériaux du lit, la température de l'eau au moment de l'échantillonnage, le type d'échantillonneur employé et l'emplacement des verticales de prélèvement d'échantillons uniques.

Un résumé des données historiques sur les sédiments est inclus. On y trouve divers renseignements comme les concentrations maximale et minimale mesurées, le débit journalier maximal des sédiments en suspension et le total pour la période. La période de relevé et le type d'exploitation des stations sont indiqués pour chaque année. Dans un résumé pour les mois de relevé, on donne la moyenne pour chaque période et pour l'ensemble des périodes de relevé ainsi que l'erreur-type de la moyenne, en pourcentage.

HISTORIQUE ET OBJECTIFS DES ÉTUDES DES SÉDIMENTS AU CANADA

Au Canada, les études dans ce domaine ont débuté en 1948 en réponse aux besoins exprimés par certains organismes fédéraux et provinciaux pour l'évaluation de projets donnés et étaient le fait d'organismes privés. Bien que les études se soient poursuivies après 1948 pour satisfaire aux besoins accrus, ce n'est qu'en 1961 que la Direction des ressources en eau les a entreprises de façon systématique.

Les buts de ces études sont de:

(1) réunir et produire des données sur les transports solides dans les cours d'eau canadiens, données dont on peut avoir besoin pour des études concernant l'environnement, la qualité des eaux et la conception de projets portant sur les ressources en eau.

(2) produire des informations concernant les transports solides.

(3) évaluer, améliorer et uniformiser le matériel et les techniques employés dans le programme d'étude des sédiments au Canada.

PUBLICATION DES DONNÉES SUR LES SÉDIMENTS

Depuis le début du programme d'étude des sédiments, la présentation des données a varié.

During the years 1948 to 1960, some sediment data were collected for several Prairie rivers to meet the needs of particular projects. The first Water Resources Paper series containing sediment data incorporated a selection of these data and also data for part of the year ending September 30, 1961, at stations established for the continuing program. The second issue was a biennial publication covering only the continuing program for the 1962 and 1963 water years. All subsequent editions titled *Sediment Data Canadian Rivers* have been published annually. The sediment data since 1978 have been presented entirely in the International System of Units (SI).

Commencing with 1984, the *Sediment Data* were published in a new format wherein Canada was divided into eight regions. The provinces each represent a separate region except for New Brunswick, Newfoundland, Nova Scotia and Prince Edward Island, which together form the Atlantic Provinces region, and the Yukon and Northwest Territories which make up another. The publications are identified by the province or territories covered and the year in which the data were collected. These data are published annually on a calendar-year basis and the stations are listed alphabetically.

A new edition, *Miscellaneous Sediment Data 1966 to 1983*, was published. It contains a tabulation of locations in Canada where miscellaneous data were collected but not previously published by the Water Survey of Canada. The following data are included in this one time publication: date and time of sample collection; instantaneous discharge or daily mean discharge; sampling vertical; instantaneous concentration; dissolved solids for some samples; type of sampler used; particle size distribution of suspended sediment in percent sand, silt and clay for some depth integrated samples and/or measurements, and some point integrated measurements; particle size distribution of bed load; particle size distribution of bed material; and the water temperature at time of sampling for some samples is also given where available.

The first edition of a *Sediment Data Reference Index* was published for data to 1972. It contains a tabulation of locations in Canada where sediment data were collected by the Water Survey of Canada. The index has been subdivided alphabetically by province or territory, with sediment survey stations also listed alphabetically. Commencing with the 1978 publication, data are presented in the International System of Units (SI) and will continue to be published biennially. The latest edition supersedes all previous editions because it contains any corrections or additions since the last publication.

The first edition of a new publication series titled *Historical Sediment Data Summary for Canadian Rivers* was produced for data to 1974. This publication contains a summary of historical monthly and annual mean suspended sediment load, and annual extremes of daily suspended sediment concentration and loads and total annual suspended load. Commencing with the 1978 publication, data are presented entirely in the International System of Units (SI). This publication has been discontinued, as much of the information is now included in the new annual *Sediment Data* publication.

De 1948 à 1960, on a recueilli des données pour plusieurs cours d'eau des Prairies en prévision de la réalisation de certains projets. La première publication contenant des données sur les sédiments a paru dans la série intitulée *Water Resources Paper*; elle présentait un choix de ces données ainsi que des données recueillies en 1961 avant le 30 septembre à des stations établies pour la réalisation du programme permanent. La deuxième publication a porté sur les données recueillies dans le cadre du programme au cours des années hydrologiques 1962 et 1963. Par la suite, les données ont été publiées annuellement sous le titre *Données sur les sédiments - rivières canadiennes*. Depuis 1978, les données sont exprimées en unités du Système international (SI).

En 1984, la présentation des *Données sur les sédiments* a été modifiée. Le Canada a été divisé en huit régions, une région pour chaque province, sauf le Nouveau-Brunswick, Terre-Neuve, la Nouvelle-Écosse et l'Île-du-Prince-Édouard qui, ensemble, forment la région des provinces de l'Atlantique, et les Territoires du Yukon et du Nord-Ouest, qui forment une autre région. Les publications sont nommées selon la région couverte et l'année des données (année civile). Ces publications sont annuelles. Les stations y sont présentées par ordre alphabétique.

Une édition récente intitulée *Données diverses sur les sédiments, 1966 à 1983* vient de paraître. On y présente sous forme de tableau les emplacements où des données diverses non encore publiées ont été recueillies au Canada par la Division des relevés hydrologiques. Cette première édition comprend des données telles que : la date et la durée de l'échantillonnage; le débit instantané ou débit journalier moyen; la verticale d'échantillonnage; les concentrations instantanées; les concentrations de matières solides en solution pour certains échantillons; le type d'échantillonneur employé; la granulométrie des sédiments en suspension en pourcentage de sable, de limon et d'argile, dans le cas de mesures avec intégration selon la profondeur ou d'échantillons intégrés sur toute la profondeur, et dans le cas de mesures par la méthode ponctuelle; la granulométrie du charriage; la granulométrie des matériaux du lit; la température de l'eau lors du prélèvement d'échantillons, lorsque celle-ci est connue.

Un *Index de référence des données sur les sédiments* est publié. La première édition portait sur les données disponibles jusqu'en 1972. Les emplacements où des données sur les sédiments ont été recueillies au Canada par la Division des relevés hydrologiques y sont présentés sous forme de tableau. L'*Index* est subdivisé selon l'ordre alphabétique par province ou territoire, et les stations de mesure des sédiments sont classées par ordre alphabétique. À partir de 1978, les données sont exprimées en unités du Système international (SI). L'*Index* est publié tous les deux ans; l'édition la plus récente annule toutes les éditions antérieures, car elle renferme toutes les corrections et mises à jour effectuées depuis la dernière parution.

Une autre série de publications a porté le titre *Sommaire chronologique des données sur les sédiments de rivières canadiennes*. La première édition renfermait les données disponibles jusqu'en 1974. Cette série présentait un résumé donnant les moyennes mensuelles et annuelles historiques du débit des sédiments en suspension, les valeurs annuelles extrêmes de la concentration journalière et du débit journalier des sédiments en suspension et le débit annuel total des sédiments en suspension. À partir de 1978, les données ont été présentées en unités du Système international (SI). Cette série a été abandonnée, car une bonne partie de l'information est maintenant contenue dans la nouvelle publication annuelle intitulée *Données sur les sédiments*.

COLLECTION AND PROCESSING OF BASIC DATA

1. *Equipment and Instrumentation*

The sediment survey program of the Water Resources Branch is conducted in cross sections on rivers selected specifically for the sediment survey or for the hydrometric survey. Certain cross sections are located at traffic bridges, while others are equipped with cableways, or automatic pump samplers.

The following sediment samplers have been used in the sediment survey program:

(a) Depth-integrating suspended sediment wading-type hand sampler, USDH-48, used on small streams or during winter periods.

(b) Depth-integrating suspended sediment sampler, USDH-59, used as a handline suspension for small and medium size streams.

(c) Depth-integrating suspended sediment samplers, USD-49, USD-74, and USD-77, used on a reel suspension for medium and large streams whose depths are less than five metres.

(d) Point-integrating suspended sediment samplers, USP-61, USP-61-A1, USP-63, and USP-72, used for point-integrating sampling, or depth-integrating sampling if the depth is over five metres, or in a cross section with velocities up to two metres per second.

(e) Automatic pump sampler is an automatic pumping system permitting unattended collecting and bottling of individual water samples pumped from a fixed point in a stream. This sampler is normally installed at isolated locations where otherwise no data would be available during ice break-up or peak periods.

(f) Bed material sampler, USBM-54, used on large or deep streams or on those streams with hard-packed streambeds.

(g) Bed material sampler, USBMH-60, used on some large or deep streams or on those streams with soft-packed streambeds.

(h) Bed material sampler, USBMH-53, used on some small or shallow streams.

(i) Lane bed material sampler, a drag-type sampler used on small streams or those with soft streambeds.

2. *Hydrometric Surveys*

The hydrometric survey includes the standard procedures for observations of water levels, streamflow measurements, water surface slope determinations if required, and observations of water temperature. The streamflow measurements are made in conjunction with the sediment load measurements and conform to the accepted standards of the regular hydrometric survey.

3. *Sediment Sampling Program*

The following is a summary of the elements associated with the Sediment Sampling Program:

(a) Periodic measurement of suspended sediment load by the

COLLECTE ET TRAITEMENT DES DONNÉES DE BASE

1. *Matériel*

L'étude des sédiments réalisée par la Direction des ressources en eau porte sur des sections transversales de cours d'eau choisis spécialement à cette fin ou pour les relevés hydrométriques. Certaines sections sont situées sous un pont, d'autres sont accessibles par téléphérique, ou sont étudiées à l'aide d'un échantillonneur sous pression.

On a utilisé les échantillonneurs suivants:

(a) L'échantillonneur intégrateur selon la profondeur, type simple, USDH-48, employé dans les cours d'eau peu profonds ou en hiver;

(b) L'échantillonneur intégrateur selon la profondeur USDH-59, utilisé comme une ligne dans les cours d'eau petits et moyens;

(c) Les échantillonneurs intégrateurs selon la profondeur USD-49, USD-74, et USD-77, fixés au bout d'une corde s'enroulant autour d'un moulinet et employés dans les cours d'eau gros ou moyens dont la profondeur est inférieure à cinq mètres;

(d) Les échantillonneurs intégrateurs USP-61, USP-61-A1, USP-63 et USP-72, employés ponctuellement ou sur toute la verticale, et utilisés lorsque la profondeur est supérieure à cinq mètres ou dans les sections transversales qui connaissent un débit qui atteint 2 m/s.

(e) Un échantillonneur automatique permettant le prélèvement en bouteilles, sans surveillance, d'échantillons uniques d'eau obtenus à l'aide d'une pompe en un point précis d'un cours d'eau; il est ordinairement installé dans un endroit isolé où aucune donnée ne pourrait être obtenue autrement au cours de la débâcle ou des périodes de débit de pointe;

(f) L'échantillonneur USBM-54 employé pour le prélèvement d'échantillons des matériaux du lit dans les cours d'eau importants ou profonds ou dans les cours d'eau dont le fond est dur;

(g) L'échantillonneur USBMH-60 employé pour le prélèvement d'échantillons des matériaux du lit dans certains cours d'eau importants ou profonds, ou dans les cours d'eau dont le fond est meuble;

(h) L'échantillonneur USBMH-53 employé pour le prélèvement d'échantillons des matériaux du lit dans certains cours d'eau petits ou peu profonds;

(i) La drague employée pour le prélèvement d'échantillons des matériaux du lit dans de petits cours d'eau ou dans des cours d'eau dont le fond est meuble.

2. *Relevés hydrométriques*

Le relevé hydrométrique comprend, entre autres, l'observation de la hauteur des eaux, la mesure du débit de l'eau, la détermination de la pente de la ligne d'eau, si nécessaire, ainsi que l'observation de la température de l'eau. Les mesures du débit de l'eau et du débit des sédiments se font conjointement, suivant les méthodes acceptées.

3. *Échantillonnage des sédiments des cours d'eau*

L'échantillonnage comporte, en gros, les éléments suivants:

(a) La mesure périodique du débit des sédiments en suspension par la méthode d'intégration sur toute la profondeur

depth-integrating method for determining the average suspended sediment concentration in the cross section.

(b) Single suspended sediment samples at a selected vertical for determining the sediment concentration for the days when suspended sediment load measurements are not taken.

(c) Limited measurement of suspended sediment load by the point-integrating method for checking depth-integrated measurements and for determining particle-size distribution in the cross section.

(d) Sampling of bed material for determining particle-size distribution.

(e) Periodic measurement of bed load.

The following is a brief explanation of the elements listed above:

(a) *Suspended Sediment Load by Depth-Integrating Method*: Measurements are made by the depth-integrating method to determine the suspended sediment load in the entire cross section of a stream, the average suspended sediment concentration in the cross section, and the size distribution of the sediment particles. It is known that the concentration of suspended sediment tends to increase from the water surface to the streambed and could vary from streambank to streambank.

When making suspended sediment equal-discharge-increment (EDI) measurements, the stream cross section is divided into at least five equal-flow panels and a representative suspended sediment sample is collected from each portion. For each panel of the cross section, the suspended sediment load (r) may then be computed by multiplying the flow (q) by the suspended sediment concentration (c):

$$r = q\ c$$

The suspended sediment load (R) for the cross section may be computed by adding the sediment loads for the five equal-flow panels:

$$R = r\ n = q_1c_1 + q_2c_2 + \ldots + q_nc_n$$

The depth-integrating method of sampling is used to measure the suspended sediment concentration. This method is based on the premise that the sampler fills at a rate proportional to the velocity of the approaching flow, and that by traversing the depth of a stream at a uniform speed, the sampler will receive a portion of water sediment mixture at every point in the vertical.

(b) *Single Suspended Sediment Samples at a Selected Vertical*: Single suspended sediment samples, consisting of two bottles each, are collected routinely using the depth or point-integrating samplers at a permanently fixed vertical in a cross section. During periods of very heavy sediment concentration, two or three single sediment samples may be taken per day, while during periods of low concentration, one single sediment sample may only be taken every few days. During extremely low flow periods, the sampling may be limited to one single sample in several weeks or months.

(c) *Suspended Sediment Load by Point-Integrating Method*: A limited number of suspended sediment load measurements are made by the point-integrating method. These measurements are included in the program (a) to check by comparison the "measured" sediment loads obtained by the depth-integrating method with the suspended sediment loads by the point-integrating method and (b) to obtain samples from which to determine particle-size distribution

pour la détermination de la concentration moyenne dans une section transversale;

(b) Le prélèvement d'échantillons uniques des sédiments en suspension selon une verticale choisie, afin de determiner la concentration des sédiments les journées où le débit des sédiments en suspension n'est pas mesuré;

(c) Un nombre restreint de mesures du débit des sédiments en suspension avec intégration en un point précis d'un cours d'eau, afin de vérifier les résultats des mesures avec intégration selon la profondeur et afin de déterminer la granulométrie des particules de sédiments dans une section transversale d'un cours d'eau;

(d) L'échantillonnage des matériaux du lit afin d'en déterminer la granulométrie;

(e) La mesure périodique du charriage.

Voici une brève description des éléments susmentionnés.

(a) *Mesure du débit des sédiments en suspension par intégration selon la profondeur*: La méthode permet de déterminer le débit des sédiments en suspension traversant toute une section transversale d'un cours d'eau, la concentration moyenne des sédiments en suspension dans la section transversale et la granulométrie des sédiments en suspension. C'est un fait connu que la concentration des sédiments en suspension augmente généralement avec la profondeur et qu'elle peut varier d'une rive à l'autre d'un cours d'eau.

Avec la méthode d'incréments de débits égaux (IDE), la mesure du débit des sédiments en suspension se fait en divisant une section transversale d'un cours d'eau en au moins cinq tranches où le débit est égal et en prélevant un échantillon représentatif dans chacune d'elles. Le débit des sédiments en suspension (r) pour chaque tranche se calcule en multipliant le débit (q) par la concentration des sédiments en suspension (c):

$$r = q\ c$$

Le débit des sédiments en suspension (R) pour la section transversale est la somme des débits des sédiments des cinq tranches:

$$R = r\ n = q_1c_1 + q_2c_2 + \ldots + q_nc_n$$

La méthode par intégration sur toute la profondeur est employée pour mesurer la concentration des sédiments en suspension. Elle suppose que l'échantillonneur se remplit à un rythme proportionnel au débit de l'eau et qu'en étant déplacé à une vitesse uniforme sur toute la verticale, il reçoit une partie du mélange eau-sédiments à tous les points de celle-ci.

(b) *Prélèvement d'échantillons uniques de sédiments en suspension sur une verticale choisie*: De tels échantillons, constitués chacun de deux bouteilles, sont prélevés régulièrement à l'aide d'appareils intégrateurs, selon la profondeur ou ponctuels, sur une verticale permanente d'une section transversale. Lorsque la concentration des sédiments est très forte, deux ou trois échantillonnages peuvent être effectués chaque jour, alors qu'un seul échantillon peut être prélevé à quelques jours d'intervalle lorsqu'elle est faible. Au cours des périodes où le débit est extrêmement faible, l'échantillonnage peut être limité à un échantillon toutes les quelques semaine ou tous les quelques mois.

(c) *Mesure du débit des sédiments en suspension par la méthode ponctuelle*: Un nombre limité de mesures du débit des sédiments en suspension sont faites avec cette méthode. On y a recours a) pour vérifier les valeurs du débit mesurées au moyen de la méthode précédente et b) pour obtenir des échantillons en vue de déterminer la granulométrie des sédiments en divers points de la

at different points in the cross section. The point-integrating sediment loads are computed by graphical methods.

The relationship between the suspended sediment concentration of the single vertical samples and the average concentration in the cross section determined from the suspended sediment load measurements is established for some stations. Using this relationship, the sediment concentrations of the single vertical samples are adjusted to reflect the average suspended sediment concentration in the cross section. These average sediment concentrations in the cross sections are plotted, and a smooth curve is drawn through the points to obtain a concentration graph. This graph represents the average suspended sediment concentration for the period of record. The daily mean concentrations are determined by automated procedures using a digitizer interfaced with a Digital minicomputer.

The daily suspended sediment loads are computed on the basis of stream discharges and the collected suspended sediment concentrations. The daily suspended sediment loads are expressed in tonnes per day and are obtained by multiplying the daily mean sediment concentration (mg/L), by the daily mean discharge (m^3/s), and the conversion factor, 0.0864.

(d) *Bed Material Sampling*: In a cross section, bed material samples are usually taken in the same sampling verticals as the suspended sediment samples. Often, additional bed material samples are collected at the water edge, the extreme water level or at other points in the cross section. The total number of bed material samples taken in a cross section usually varies between five and nine.

(e) *Bed Load Measurement*: There are several methods available for measurement of bed load (volumetric method, measurement by samplers, method of tracers, method of constricted cross section, study of sound waves, etc.). The measurement methods should be selected in accordance with river regime.

4. *Total Sediment Load*

Sediment transport may be divided into two categories: sediment maintained in suspension in the stream (suspended load), and sediment being carried along the streambed (bed load). To measure the total sediment load, each of these must be measured separately and then totalled. The total sediment load was not computed for this publication.

5. *Sediment Survey Laboratories*

The Water Resources Branch maintain sediment survey laboratories in New Westminster, British Columbia; Regina, Saskatchewan; Guelph, Ontario; and Moncton, New Brunswick. The laboratories are equipped to perform the following analyses:

(a) determination of sediment concentration by (1) filtration method, (2) evaporation method and (3) determination of total dissolved solids by evaporation method.
(b) particle-size distribution analysis by (1) bottom withdrawal tube method, (2) sieving and (3) hydrometer method.

Determination of the sediment concentration by the evaporation method is carried out by evaporating the water from the settled sediment sample, with the results being corrected for dissolved solids. The quantity of dissolved solids is determined by evaporating a portion of the decanted water of a sample. In the filtration method, the suspended sediment concentration of water samples is determined by utilizing Gooch crucibles with a Reeve Angel 934AH filter and a Millipore AP20 prefilter and a vacuum system.

section transversale. Cette méthode fait appel à des graphiques pour le calcul du débit des sédiments.

Le rapport entre la concentration des sédiments en suspension dans les échantillons prélevés sur une seule verticale et la concentration moyenne dans la section transversale, telle que déterminée à partir des mesures du débit des sédiments en suspension, est établi pour quelques stations. Il permet de corriger les concentrations mesurées à une seule verticale de manière à donner la concentration moyenne dans la section transversale. Les concentrations moyennes ainsi déterminées sont reportées sur un graphique, et une courbe lisse passant par les points marqués est tracée. Le graphique obtenu représente la concentration moyenne des sédiments en suspension pour la période de relevé. Les concentrations moyennes quotidiennes sont déterminées automatiquement à l'aide d'un convertisseur analogique-numérique relié à un mini-ordinateur numérique.

Les valeurs journalières du débit des sédiments en suspension sont calculées à partir du débit du cours d'eau et des concentrations des sédiments en suspension recueillis. Elles sont exprimées en tonnes par jour. On les détermine en multipliant la concentration moyenne journalière des sédiments (mg/L) par le débit moyen journalier (m^3/s) et par un facteur de conversion approprié, 0.0864.

(d) *Échantillonnage des matériaux du lit*: Dans une section transversale, les échantillons des matériaux du lit sont ordinairement prélevés aux mêmes verticales que ceux des sédiments en suspension. Souvent, des échantillons supplémentaires sont pris près des rives, là où le niveau d'eau est extrême et à d'autres points de la section transversale. Leur nombre total pour une section donnée varie ordinairement entre cinq et neuf.

(e) *Mesure du charriage*: La mesure peut se faire par plusieurs méthodes (méthode volumétrique, mesure à l'aide d'échantillonneurs, méthode des traceurs, méthode de la section transversale rétrécie, étude des ondes sonores, etc.). Le choix se fondera sur la nature du régime du cours d'eau.

4. *Débit solide total*

Il y a deux catégories de sédiments: les sédiments maintenus en suspension au sein de l'eau (sédiments en suspension), et les sédiments charriés sur le lit d'un cours d'eau (charriage de fond). Les deux types de sédiments doivent être mesurés séparément et leurs valeurs additionnées si on veut mesurer le débit total des sédiments. Toutefois, on ne l'a pas calculé aux fins de la présente publication.

5. *Laboratoires d'analyse*

La Direction des ressources en eau possède des laboratoires d'analyse des sédiments à New Westminster (Colombie-Britannique), Regina (Saskatchewan), Guelph (Ontario) et Moncton (Nouveau-Brunswick). Les laboratoires disposent des appareils nécessaires pour effectuer les analyses suivantes:

(a) la détermination de la concentration des sédiments par (1) filtration, (2) évaporation, et (3) détermination des matières dissoutes totales par évaporation.
(b) l'analyse granulométrique (1) par extraction des sédiments déposés dans un tube, (2) par l'emploi de tamis et (3) par l'utilisation d'un hydromètre.

La méthode par évaporation consiste à faire évaporer l'eau d'un échantillon de sédiments décanté et à corriger les résultats pour tenir compte des matières dissoutes. La quantité de celles-ci est déterminée en faisant évaporer une partie de l'eau de l'échantillon décanté. Dans la méthode par filtration, on utilise sous vide des creusets de Gooch munis d'un filtre Reeve Angel 934AH et d'un préfiltre Millipore AP20.

Particle-size analysis was carried out for some suspended sediment samples having gross weights in the range of 0.15 to 5 g using the Bottom Withdrawal Tube method. The particle-size distribution of the Bottom Withdrawal Tube method ranges from 0.002 to 1.000 mm. The Sieve analysis method may be used for samples with a large amount of material coarser than 0.062 mm.

The particle-size classification used in this report agrees with recommendations made by the American Geophysical Union Subcommittee on Sediment Terminology. The classification is as follows:

Classification	Size (mm)
Clay	0.000 24 - 0.004
Silt	0.004 - 0.062
Sand	0.062 - 2.0
Gravel	2.0 - 64.0

The particle-size distributions given in this report are not necessarily representative of all particles in transport in the stream. Most of the organic material is removed and the sample is subjected to mechanical and chemical dispersion before analyzed in distilled water. Chemical dispersion is not used for native-water analysis.

6. *Accuracy and Reliability of Field Data and Computed Results*

The overall accuracy and degree of reliability of the sediment data is dependent upon many factors. Some of the more important of these are:

(a) accuracy and reliability of streamflow records;
(b) regime of the river;
(c) type of sampling equipment used to collect the suspended sediment samples;
(d) frequency of suspended sediment discharge measurements;
(e) frequency of individual sampling;
(f) quality of the relationship between the average suspended sediment concentration in the cross section and the concentration of the individual samples;
(g) frequency and method of bed material sampling;
(h) frequency and method of bed load measurements;
(i) accuracy and reliability of the laboratory analysis;
(j) selected methods of computation of the suspended sediment discharge;
(k) interpretation and extrapolation of sediment records.

An assessment of the quality of the records can be made by an examination of the occurrence of the symbol (S) on the daily mean concentrations.

In general, data collected during open-water periods are more reliable than those collected during periods of ice conditions or those records obtained by estimation. Further, water level data collected utilizing a water-stage recorder are more reliable and accurate than those using a manual gauge only, especially for small or flashy streams.

Une analyse granulométrique a été effectuée pour certains échantillons de sédiments en suspension ayant un poids brut dans l'intervalle de 0.15 à 5 g par la méthode de la burette (extraction des sédiments déposés, à divers intervalles). La distribution de la taille des particules déterminée par cette méthode varie de 0.002 à 1.000 mm. La méthode de tamisage peut être employée pour les échantillons ayant une forte quantité de particules de taille supérieure à 0.062 mm.

La classification granulométrique qui est utilisée dans la présente publication est conforme aux recommandations faites par l'*American Geophysical Union Subcommittee on Sediment Terminology*. La classification est la suivante:

Classification	Taille (mm)
Argile	0.000 24 - 0.004
Limon	0.004 - 0.062
Sable	0.062 - 2.0
Gravier	2.0 - 64.0

La répartition granulométrique qui est fournie dans cette publication, n'est pas obligatoirement représentative de toutes les particules qui sont transportées par un cours d'eau donné. La plupart des matières organiques sont extraites de l'échantillon qui est ensuite soumis à une dispersion mécanique et chimique avant d'être analysé dans de l'eau distillée. La dispersion chimique ne sert pas à l'analyse de l'eau naturelle.

6. *Exactitude des données et des résultats*

L'exactitude des données sur les sédiments dépend de nombreux facteurs. On peut citer, parmi les plus importants:

(a) l'exactitude des données sur les débits;
(b) le régime d'un cours d'eau;
(c) le type d'appareil d'échantillonnage utilisé pour prélever les échantillons de sédiments en suspension;
(d) la fréquence des mesures du débit des sédiments en suspension;
(e) la fréquence des échantillonnages isolés;
(f) la qualité du rapport entre la concentration moyenne des sédiments en suspension dans une section transversale et la concentration des échantillons isolés;
(g) la fréquence des échantillonnages des matériaux de fond et la méthode utilisée;
(h) la fréquence des mesures du charriage de fond et la méthode utilisée;
(i) l'exactitude des analyses de laboratoire;
(j) les méthodes de calcul du débit des sédiments en suspension;
(k) l'interprétation et l'extrapolation des données sur les sédiments.

La qualité des données peut être évaluée d'après la fréquence d'utilisation du symbole (S), avec les données sur la concentration journalière moyenne.

En général, les données recueillies au cours des périodes d'eau libre sont plus sûres que celles qui sont obtenues au cours des périodes de glaces ou par estimation. De plus, les données sur le niveau des eaux qui sont mesurées à l'aide d'un limnigraphe sont plus certaines et plus exactes que celles qui sont mesurées à l'aide d'une jauge manuelle seulement, surtout dans le cas des petits cours d'eau ou des cours d'eau à crues très rapides.

METHOD OF TABULATION OF SEDIMENT DATA

For stations where the suspended sediment load was obtained, the following data are given where available:

1. The table of *Suspended Sediment Load* includes the daily mean discharge in cubic metres per second, the daily mean concentration in milligrams per litre, and the daily suspended sediment load in tonnes per day. The total monthly discharge and total monthly sediment load are also given for each month of record.

For stations where the sediment load in tonnes per day are produced for complete or partial years, the *Total Suspended Load* for the period is given in the descriptive information.

For stations where only suspended sediment concentrations are obtained, the table of *Suspended Sediment Load* will not be given.

Additional descriptive information about the sediment station is also given and will indicate the following, where applicable.

Location – the latitude and longitude co-ordinates of the location of the gauge are given. For stations where the gauge is located an appreciable distance from the discharge measurement section, these co-ordinates give the location of the discharge measurement section.

Drainage area – refers to that area enclosed by a topographic divide such that direct surface runoff from precipitation would drain by gravity into the stream upstream from the location of the station.

Type of Flow – where the flow is known to be natural, this is indicated. The flow of water in many river systems is affected by upstream regulation. In some cases, the extent of this regulation is not known and therefore is not indicated. However, where the regulation is known to be "appreciable", this is indicated as well as the year that the regulation began, if known.

Type of Gauge – refers to the installation or method used to obtain water level or discharge data:

(a) Manual – a non-recording type of gauge from which observations of stage normally are obtained once daily.

(b) Recording – a water-stage recorder from which continuous water levels are obtained on an analog chart. For most International Gauging Stations located in the United States, water level records are obtained utilizing a digital recorder.

International Gauging Station – on waters adjacent to the international boundary, certain gauging stations have been

PRÉSENTATION DES TABLEAUX DE DONNÉES SUR LES SÉDIMENTS

Pour les stations de mesure du débit des sédiments en suspension, les données suivantes sont présentées, pour autant qu'elles sont disponibles:

1. Le tableau concernant le *débit des sédiments en suspension* (The table of Suspended Sediment Load) donne le débit journalier moyen de l'eau, en mètres cubes par seconde, la concentration journalière moyenne, en milligrammes par litre, et le débit journalier des sédiments en suspension, en tonnes par jour. Chaque mois les données indiquent également les débits mensuels totaux de l'eau et des sédiments.

Dans le cas des stations où le débit des sédiments, en tonnes par jour, est fourni pour une année complète ou une partie de l'année, le total pour la période est indiqué.

Dans le cas des stations où seule la concentration des sédiments en suspension est obtenue, ce tableau est absent.

Des renseignements descriptifs additionnels au sujet de la station sont également présentées. On peut y apporter les précisions suivantes:

Emplacement (Location) – La latitude et la longitude de la station de jaugeage sont indiquées. Dans les cas où l'équipement de mesure est situé à une bonne distance de la section où le jaugeage est effectué, on indique les coordonnées de cette section.

Superficie du bassin versant (Drainage area) – Désigne la zone délimitée par une ligne de faîte de sorte que l'écoulement de surface direct provenant des précipitations est entraîné par gravité vers le cours d'eau, en amont de la station.

Type de débit (Type of Flow) – Un débit reconnu comme naturel est indiqué. Le débit de nombreux réseaux hydrographiques est modifié par une régularisation effectuée en amont. Dans certains cas, l'importance de cette régularisation n'est pas connue, et elle n'est donc pas indiquée. Cependant, quand on sait que la régularisation est d'une certaine importance, on l'indique, ainsi que l'année où elle a débuté (si elle est connue).

Type de jauge (Type of Gauge) – Il s'agit des jauges ou des méthodes de jaugeage utilisées pour obtenir les données sur le niveau ou le débit d'un cours d'eau.

(a) *Manuel* (Manual) – Indique qu'un appareil non enregistreur est employé pour obtenir normalement une fois par jour les données sur le niveau et le débit du cours d'eau.

(b) *Enregistreuse* (Recording) – Indique qu'un limnigraphe permet de mesurer de façon continue le niveau des eaux qui est tracé sur un graphique. La plupart des stations internationales de jaugeage des États-Unis obtiennent les données sur le niveau des eaux à l'aide d'un enregistreur numérique.

Station internationale de jaugeage (International Gauging Station) – Dans les eaux contiguës aux frontières, on a

designated as "International" and records are approved jointly. Differences between figures published herein and corresponding figures in United States Water Supply Papers are due to variations in automated data processing techniques.

Contributed Data – if data were supplied in their entirety or partially by an outside agency, the name of this co-operating agency is given.

Remarks – contains a statement pertaining to the sediment sample collection.

2. The table of *Instantaneous Suspended Sediment Concentration* for depth-integrating samples includes the following: Date and Time of the sample collection; Water Temperature; Instantaneous Discharge at time of sampling, (if not available the daily mean discharge is given and indicated by a symbol); Single Sampling Vertical location; Dissolved Solids; Percent Sand, Silt and Clay; Type of Sampler used. The particle-size distribution in percent in millimetres and the percent Sand, Silt and Clay, is given where available.

The Single Sampling Vertical Location is defined by many symbols, which are as follows, where applicable:

DIGITS - 5, 14, 130, etc., is the distance in metres from the initial point
WERB - Water's Edge RIGHT Bank
WELB - Water's Edge LEFT Bank
1QRB - One-quarter the distance FROM the RIGHT Bank
3QRB - Three-quarters the distance FROM the RIGHT Bank
1QLB - One-quarter the distance FROM the LEFT Bank
3QLB - Three-quarters the distance FROM the LEFT Bank
MID - MID STREAM
MULT - Composite sediment measurement

For the suspended sediment measurements, the Date; Time; Water Temperature at time of sampling; Discharge computed for each sampling panel; Concentration; Sampling Vertical; Dissolved Solids; Percent Sand, Silt and Clay; Type of Sampler used; and the Particle-size distribution of the Sand, Silt and Clay, in percent is given where available.

3. The table of *Split Vertical Suspended Sediment* for depth-integrating samples includes the following: Date and Time of the sample collection; Water Temperature; Instantaneous Discharge at time of sampling, (if not available the daily mean discharge is given and indicated by a symbol); Sampling Vertical; Depth of Sample (giving the depth sampled from and the depth sampled to); Concentration of Sample, in milligrams per litre, Dissolved solids, in milligrams per litre; and the Particle-size distribution in percent in millimetres and the percent Sand, Silt and Clay are also given.

désigné certaines stations comme «internationales», et les données obtenues sont approuvées par les pays concernés. Les différences entre les chiffres publiés dans la présente publications et dans les *United States Water Supply Papers* sont dues à des variantes dans les techniques de traitement automatique des données.

Données fournies (Contributed Data) – Lorsqu'un organisme extérieur a fourni toutes les données ou une partie des données, son nom est indiqué.

Remarques (Remarks) – Renseignements au sujet du prélèvement des échantillons de sédiments.

2. Le tableau des *concentrations instantanées de sédiments en suspension* (The table of Instantaneous Suspended Sediment Concentration) pour les échantillons obtenus par intégration selon la profondeur comprend: la date et l'heure de prélèvement; la température de l'eau; son débit instantané au moment de l'échantillonnage (s'il n'est pas connu, le débit journalier moyen, avec symbole); l'emplacement de la verticale d'échantillonnage; la concentration des matières dissoutes; les pourcentages de sable, de limon et d'argile; le type d'échantillonneur employé; et la granulométrie du sable, du limon et de l'argile, en pourcentage en millimètres et le pourcentage des particules est donné lorsqu'il est disponible.

Le site vertical d'échantillonnage unique est défini par plusieurs symboles dont les suivants dans certains cas :

CHIFFRE - 5, 14, 130, etc., désigne la distance en mètres à partir du point initial
WERB - Bord de l'eau, rive DROITE
WELB - Bord de l'eau, rive GAUCHE
1QRB - Un quart de la distance À PARTIR de la rive DROITE
3QRB - Trois quarts de la distance À PARTIR de la rive DROITE
1QLB - Un quart de la distance À PARTIR de la rive GAUCHE
3QLB - Trois quarts de la distance À PARTIR de la rive GAUCHE
MID - MI-DÉBIT
MULT - Mesure des sédiments mixtes

Pour les mesures des sédiments en suspension, la date, l'heure, la température de l'eau au moment de l'échantillonnage, le débit calculé pour chaque tranche de la section d'échantillonnage, la concentration et la verticale d'échantillonnage, la concentration des matières dissoutes; les pourcentages de sable, de limon et d'argile; le type d'échantillonneur employé; et la granulométrie du sable, du limon et de l'argile, en pourcentage des particules est donnée lorsqu'elle est disponible.

3. Le tableau des *sédiments en suspension fractionnés pris à la verticale* (The Table of Split Vertical Suspended Sediment) pour les échantillons obtenus par intégration selon la profondeur comprend les éléments suivants : la date et l'heure de l'échantillonnage; la température de l'eau; le débit instantané au moment de l'échantillonnage (s'il n'est pas disponible, on donne le débit moyen quotidien et on l'indique par un symbole), la verticale d'échantillonnage; la profondeur (donner la profondeur à laquelle l'échantillon a été pris); et la profondeur à laquelle l'échantillon a été attributé la concentration des échantillons, en milligrammes par litre; la concentration des matières dissoutes, en milligrammes par litre; la distribution des sédiments de la taille de particules en pourcentage en millimètres; le pourcentage de sable, de limon et d'argile.

4. The table of *Point Integrating Particle-size of Suspended Sediment* includes the following: Date and Time of the sample collection; Water Temperature; Panel Discharge for each sampling vertical; Sampling Vertical; Depth of Sample; Concentration of Sample, in milligrams per litre; Dissolved Solids in milligrams per litre, and the Particle-size distribution in percent in millimetres and the percent Sand, Silt and Clay are also given.

5. The table of *Bed Load Particle-size* includes the following: Date and Time of the sample collection; Panel Discharge; Sampling Vertical and the Type of Sampler used in the collection of the sample and the Particle-size distribution, in percent in millimetres, for each sample of bed load collected.

6. The table of *Bed Material Particle-size* includes the following: Date and Time of the sample collection; Panel Discharge; Sampling Vertical and the Type of Sampler used in the collection of the sample and the Particle-size distribution, in percent in millimetres, for each sample of bed material collected.

7. The table of *Historical Sediment Data Summary* gives the following, for the period of record, where applicable.

   (a) Record Summary
   (b) Type of Sampling
   (c) Sampled Concentration, maximum and minimum
   (d) Suspended Sediment Load, maximum daily and the total, for the period, in tonnes
   (e) Summary, including mean load, the historical mean load and the standard error of the mean in percent.

(a) The *Record Summary* gives the months of record that data are available. If the complete month is on file the symbol (C) is shown, while partial months of data are indicated by the symbol (P). Months with no data on file are indicated by (-).

(b) The *Type of Sampling* indicates the type of sampling method used to collect the sediment samples during the period of operation. If the samples were collected by manual methods this is indicated by "MANUAL." If the samples were collected by a pump sampler or some other automatic method this is indicated by "AUTO." If both manual and automatic sampling methods were used this is indicated by "DUAL."

(c) The *Sampled Concentration* gives the maximum and minimum concentration, in milligrams per litre, and the date of collection for each year of record. The extreme recorded for the period of record is indicated by an asterisk (*). If more than one maximum or minimum, of the same value, occurred during the year only the date of the first occurrence is identified by the asterisk.

(d) The *Suspended Sediment Load* gives the maximum daily load, in tonnes, and the date of occurrence. The extreme recorded is indicated by an asterisk (*). The Total for the Period gives

4. Le tableau de la *granulométrie des échantillons ponctuels et intégrés des sédiments en suspension* (The table of Point Integrating Particle-size of Suspended Sediment) comprend: la date et l'heure de prélèvement de l'échantillon, la température de l'eau, le débit de la tranche de la section pour chaque verticale d'échantillonnage, la verticale d'échantillonnage, la profondeur de l'échantillon, la concentration des échantillons, en milligrammes par litre, la concentration des matières dissoutes, en milligrammes par litre, et granulométrie en millimètres et en pourcentage du sable, du limon et de l'argile.

5. Le tableau de la *granulométrie des sédiments charriés* (The table of Bed Load Particle-size) comprend: la date et l'heure de prélèvement de l'échantillon, le débit de la tranche de la section, la verticale d'échantillonnage et le type d'échantillonneur employé et le pourcentage en millimètres des particules pour chaque échantillon recueilli du charriage.

6. Le tableau de la *granulométrie des matériaux du lit* (The table of Bed Material Particle-size) comprend: la date et l'heure de prélèvement de l'échantillon, le débit de la tranche de la section, la verticale d'échantillonnage et le type d'échantillonneur employé et le pourcentage en millimètres des particules pour chaque échantillon recueilli.

7. Le tableau du *sommaire chronologique des données sur les sédiments* (The table of Historical Sediment Data Summary) donne, pour la période pour laquelle les données sont disponibles, les renseignements suivants lorsque de telles données existent:

   (a) Le sommaire du relevé
   (b) Le type d'échantillonnage
   (c) Les concentrations mesurées, maximum et minimum
   (d) Le débit des sédiments en suspension, maximum quotidien et le total pour la période en tonnes
   (e) Résumé, comprend le débit moyen, le débit moyen chronologique et l'erreur type de la moyenne en pourcentage.

(a) Le *sommaire du relevé* donne les mois de relevé pour lesquels les données sont disponibles. Le symbole (C) indique que les données sont disponibles pour tout le mois. Le symbole (P) indique que ces données ne sont disponibles que pour une partie du mois. Enfin, on indique par (-) les mois qui n'ont pas de données.

(b) Le *type d'échantillonnage* indique le type de méthode d'échantillonnage que l'on utilise dans le prélèvement des échantillons de sédiments pendant la période d'exploitation. Si le prélèvement des échantillons se fait par des méthodes manuelles, on indique «MANUEL». Si le prélèvement des échantillons se fait au moyen d'échantillonneur à pompe ou par quelque autre méthode automatique, on indique «AUTO». Si on utilise à la fois des méthodes d'échantillonnage manuelles et automatiques, on indique «DOUBLE».

(c) Pour les *concentrations mesurées* (Sampled Concentration), on donne la concentration maximale et la concentration minimale, en milligrammes par litre, et leur date d'obtention pour chaque année de relevé. La valeur extrême enregistrée est indiquée par un astérisque (*). Si la valeur du maximum ou du minimum a été mesurée plus d'une fois pendant l'année, on signale, par l'astérisque, seulement la date de la première mesure.

(d) Sous le *débit des sédiments en suspension* (Suspended Sediment Load), on donne le débit journalier maximal, en tonnes, et sa date de mesure. Le débit extrême enregistré est indiqué

the total load for the period or year, in tonnes. The extreme recorded is also indicated by an asterisk (*). If more than one maximum or minimum, of the same value, occurred during the year only the date of the first occurrence is identified by the asterisk. A load which has been revised since the previous publication is marked with the symbol (R) for Revision.

(e) The *Summary* gives the *Mean Load* and the *Historical Mean Load* in tonnes.

The *Standard Error of the Mean* % is calculated using the following equations:

$$SEM = \frac{S}{\bar{x}\sqrt{n}} \times 100\%$$

and

$$S = \sqrt{\frac{\Sigma (x - \bar{x})^2}{n - 1}}$$

where SEM is the Standard Error of the Mean.

- S is the Standard Deviation of the annual mean loads.
- x is the annual Mean Load variable.
- $\bar{x}$ is the Historical Mean Load or the arithmetic mean of the annual Mean Loads.
- n is the number of years for which there is an annual Mean Load.

For stations with only instantaneous samples, this table will not include the *Suspended Sediment Load* or the statistical information in the *Summary*.

DEFINITION OF TERMS

The following definitions are given to clarify the terms used in this publication:

Automatic pump sample is an individual water-sediment mixture pumped from a fixed point in a stream.

Bed load is that material moving in almost continuous contact with the streambed, being rolled or pushed along the bottom by the force of the water.

Bed material is the sediment mixture of which the streambed is composed.

Daily load is the suspended sediment load expressed in tonnes for a particular day. The daily load is obtained by multiplying the daily mean sediment concentration (mg/L) by the daily mean discharge (m^3/s) and the conversion factor, 0.0864.

Daily mean concentration is a time-weighted mean value and is computed from a manually constructed concentration curve. The mean concentration value may be determined arithmetically or graphically. The arithmetic mean is obtained either by (1) selecting values from the concentration graph that represents uniform intervals of time and taking the arithmetic average or by (2) selecting values from the graph that represent unequal intervals of time and weighing these values by the

par un astérisque (*). Le débit total pour la période ou pour l'année est indiqué. La valeur extrême est également signalée par un astérisque (*). Si la valeur du maximum ou du minimum a été mesurée plus d'une fois pendant l'année, on signale, par l'astérisque, seulement la date de la première mesure. La lettre R indique qu'une valeur du débit a été révisée depuis la dernière publication.

(e) Le *résumé* donne le *débit moyen* et le *débit moyen chronologique*, en tonnes.

L'*erreur-type de la moyenne* % (Standard Error of the Mean), est calculée à l'aide des équations suivantes:

$$SEM = \frac{S}{\bar{x}\sqrt{n}} \times 100\%$$

et

$$S = \sqrt{\frac{\Sigma (x - \bar{x})^2}{n - 1}}$$

où SEM est l'erreur type de la moyenne.

- S est l'écart type des débits moyens annuels.
- x est la variable du débit moyen annuel.
- $\bar{x}$ est le débit moyen chronologique ou la moyenne arithmétique des débits moyens annuels.
- n est le nombre d'années où il y a un débit moyen annuel.

Dans le cas des stations ne prélevant que des échantillons instantanés, ce tableau ne donnera pas le *débit des sédiments en suspension* ni les données statistiques du *résumé*.

DÉFINITION DES TERMES

Les définitions suivantes sont présentées afin de faciliter la compréhension des termes utilisés dans la présente publication:

Échantillonnage automatique à l'aide d'une pompe (Automatic pump sample): Prélèvement d'un mélange de sédiments et d'eau au moyen d'une pompe fonctionnant automatiquement, en un point précis d'un cours d'eau.

Charriage (Bed load): Matières roulées ou poussées sur le fond sous l'action de l'eau, mais restant en contact presque permanent avec le fond.

Matériau du lit (Bed material): Mélange de sédiments composant le lit d'un cours d'eau.

Débit journalier des sédiments en suspension (Daily load): Débit des sédiments en suspension exprimé en tonnes par jour, pour une journée donnée. On l'obtient en multipliant la concentration journalière moyenne des sédiments (mg/L) par le débit journalier moyen de l'eau (m^3/s) et le facteur de conversion 0.0864.

Concentration journalière moyenne (Daily mean concentration): Moyenne pondérée en fonction du temps, calculée à partir d'une courbe de la concentration établie manuellement. La valeur de la concentration moyenne peut être déterminée arithmétiquement ou graphiquement. Pour la déterminer arithmétiquement, on peut, soit choisir sur la courbe des valeurs représentant des intervalles uniformes de temps et faire la moyenne arithmétique, soit choisir sur cette courbe

time intervals represented by the concentrations. For graphical explanation refer to *Office Procedures for Sediment Data Computations* and for the automated graphical explanation refer to *Automated Hydrometric Computation Procedures*.

Depth-integrated sediment sample is a suspended sediment sample collected at a single vertical in a cross section in a sampler moving vertically at a constant transit rate and represents an average sample for that part of the depth ranging from the water surface to about nine centimetres above the streambed.

Instantaneous suspended sediment sample is a sample collected at a fixed vertical in a river cross section.

Measured suspended sediment discharge is the suspended sediment discharge that can be computed from stream discharge and the concentration of sediment determined from depth-integrated sediment samples.

Particle-size analysis is the process of determining the size distribution of particles in a sediment sample.

Point-integrated sediment sample is a sample of the water-sediment mixture taken over a specified period of time at a fixed point and depth in a river cross section.

Sediment is fragmental material which has been deposited, eroded or transported by a flowing stream.

Sediment hydrograph is a graph showing the variation of suspended sediment concentration or sediment discharge with respect to time.

Single sample is a sample taken at a selected permanent vertical in a cross section. Two bottles of water-sediment mixture make up each single sample.

Single sampling vertical is a selected permanent vertical in a cross section in which single suspended sediment samples are collected.

Suspended sediment is sediment that moves in suspension in water either as a colloid or through the influence of the upward component of turbulent currents.

Suspended sediment concentration is the ratio of the weight of dry solids in a water-sediment mixture to the volume of the mixture. The units of this ratio are "milligrams per litre" (mg/L).

Suspended sediment load is the quantity of suspended sediment transported through a cross section per unit of time.

des valeurs qui représentent des intervalles inégaux de temps et pondérer ces valeurs en fonction des intervalles de temps correspondants. En ce qui concerne les méthodes graphiques, consulter *Méthodes de bureau pour les calculs de données sur les sédiments* et, pour la méthode automatisée, *Automated Hydrometric Computation Procedures*.

Échantillon intégré sur toute la profondeur (Depth integrated sediment sample): Échantillon des sédiments en suspension prélevé sur une verticale précise d'une section transversale d'un cours d'eau à l'aide d'un échantillonneur se déplaçant verticalement à une vitesse constante; il représente un échantillon moyen des matières en suspension entre la surface de l'eau et environ 9 cm du fond.

Échantillon instantané de sédiments en suspension (Instantaneous suspended sediment sample): Échantillon prélevé à une verticale précise d'une section transversale d'un cours d'eau.

Débit mesuré des sédiments en suspension (Measured suspended sediment discharge): Débit des sédiments en suspension qui peut être calculé à partir du débit du cours d'eau et de la concentration des sédiments déterminée à partir d'échantillons intégrés sur toute la profondeur.

Analyse granulométrique (Particle-size analysis): Détermination de la répartition de la taille des particules dans un échantillon de sédiments.

Échantillon ponctuel et intégré (Point-integrated sediment sample): Échantillon constitué d'un mélange d'eau et de sédiments, prélevé au cours d'une période de temps donnée en un point précis d'une section transversale d'un cours d'eau et à une profondeur donnée.

Sédiments (Sediment): Matières fragmentaires qui ont été déposées, érodées ou transportées par un cours d'eau.

Hydrogramme des sédiments (Sediment hydrograph): Graphique représentant la variation de la concentration des sédiments en suspension ou du débit des sédiments en fonction du temps.

Échantillon unique (Single sample): Échantillon prélevé sur une verticale permanente particulière dans une section transversale. Deux bouteilles du mélange eau-sédiments constituent un seul échantillon.

Verticale d'échantillonnage unique (Single sampling vertical): Verticale permanente d'une section transversale où des échantillons uniques de sédiments en suspension sont prélevés.

Sédiments en suspension (Suspended sediment): Matériaux qui se déplacent au sein de l'eau, soit sous forme colloïdale, soit sous l'influence des forces ascendantes des courants turbulents.

Concentration des sédiments en suspension (Suspended sediment concentration): Rapport entre le poids des matières solides sèches contenues dans un mélange eau-sédiments et le volume du mélange. Les unités employées sont les «milligrammes par litre» (mg/L).

Débit des sédiments en suspension (Suspended sediment load): Quantité de sédiments en suspension transportés par unité de temps à travers une section transversale d'un cours d'eau.

Total sediment load is the sum of the suspended sediment load and the bed load.

Unmeasured sediment load is the difference between total sediment load and measured suspended sediment load.

DEFINITION OF SYMBOLS

Symbols are located at the bottom of the data sets under the headings Time, Discharge, Concentration, and Dissolved Solids. The symbols with their definitions are listed below.

Time Symbol

E – *Estimated* – indicates estimated data. It indicates that the time of sample collection is estimated by some indirect method or comparison with other stream data.

Discharge Symbol(s)

A – *Manual Gauge* – indicates that one or more manual gauge observations per day were obtained and used as the mean for the day for a gauging station equipped with a recording gauge. This symbol is used during open-water periods only.

B – *Ice Conditions* – indicates the presence of ice at the gauging station. For gauging stations where discharge data are obtained, this symbol indicates that the presence of ice has affected the stage-discharge relationship.

E – *Estimated* – indicates estimated data. It indicates that the values recorded are estimated by some indirect method such as interpolation, extrapolation, comparison with other streams or by comparison with meteorological data.

H – *Daily Mean Discharge* – is the mean discharge for a particular day, usually referred to as the "daily mean discharge".

V – *Daily Mean; Manual Gauge* – is the mean discharge for a particular day and indicates that one or more manual gauge observations per day were obtained and used as the mean for the day.

W – *Daily Mean; Ice Conditions* – is the mean discharge for a particular day and indicates that the presence of ice has affected the stage-discharge relationship.

Y – *Daily Mean; Estimated* – is the mean discharge for a particular day and indicates that the value has been estimated by some indirect method.

Concentration Symbol(s)

C – *Coarse Material Present* – indicates that during the laboratory analysis coarse material (sand) was observed in the sediment sample.

Débit total des sédiments (Total sediment load): Somme du débit des sédiments en suspension et du débit charrié.

Débit non mesuré des sédiments (Unmeasured sediment load): Différence entre le débit total des sédiments et le débit mesuré des sédiments en suspension.

DÉFINITION DES SYMBOLES

Les symboles figurent au bas des séries de données et sont traités sous les rubriques Temps, Débit, Concentration, Matières solides en solution. Ces symboles avec leurs définitions sont donnés dans la liste ci-après.

Symbole du temps :

E – *Estimative* – Indique des données estimatives, c'est-à-dire que l'heure de prélèvement de l'échantillon est évaluée de façon indirecte ou par comparaison avec d'autres données sur les cours d'eau.

Symbole(s) du débit :

A – *Turbidisonde simple* – Indique qu'on a effectué à une station de jaugeage dotée d'une turbidisonde enregistreuse au moins une observation par jour à l'aide d'une turbidisonde simple et qu'on s'en est servi comme moyenne pour la journée en question. Le symbole n'est employé qu'au cours des périodes d'eau libre.

B – *Glaces* – Indique la présence de glaces à la station de jaugeage, qui ont faussé la relation hauteur-débit.

E – *Estimative* – Indique des données estimatives, c'est-à-dire que les valeurs enregistrées sont évaluées de façon indirecte, par exemple par interpolation, extrapolation, ou par comparaison avec d'autres cours d'eau ou avec des données météorologiques.

H – *Débit journalier moyen* – Débit moyen pour une journée donnée, ordinairement appelé «débit journalier moyen».

V – *Débit journalier moyen; turbidisonde simple* – Débit moyen pour une journée donnée; indique qu'on a effectué au moins une observation par jour et qu'on s'en est servi comme moyenne pour la journée en question.

W – *Débit journalier moyen; glaces* – Débit moyen pour une journée donnée; indique que la présence de glaces a faussé la relation hauteur-débit.

Y – *Débit journalier moyen; estimative* – Débit moyen pour une journée donnée; indique que la valeur a été évaluée de façon indirecte.

Symbole(s) de la concentration :

C – *Sable grossier présent* – Indique qu'au cours de l'analyse en laboratoire on a observé du sable grossier dans un échantillon de sédiments.

F – Sample Bottle Filled – indicates that during the laboratory analysis it was observed that the sample bottle had been filled to capacity.

G – Organic Material Present – indicates that during the laboratory analysis it was observed that organic material was collected in the sample bottle.

Single Vertical Symbol(s)

K – Sampling vertical not at the regular single vertical from LEFT bank – indicates that a sample was collected at a location from the left bank, in a cross-section, which is not at the regular single vertical.

L – Sediment measurement vertical not at the regular measurement cross-section from LEFT bank – indicates that the measurement sampling verticals were established from the left bank, in a cross-section which is not the regular measurement cross-section.

M – Sediment measurement vertical – indicates that the sampling vertical is one of several, usually five, and represents a panel width. The instantaneous discharge represents the flow for a panel width.

X – Sampling vertical not at the regular single vertical – indicates that a sample was collected at a location, in a cross-section, which is not at the regular single vertical. The location of the regular single vertical is given at the bottom of the Instantaneous Suspended Sediment data.

Z – Sediment measurement vertical not at the regular measurement cross-section – indicates that a suspended sediment measurement was collected in a cross-section which is not the regular measurement corss-section.

Note: If no symbol is present the samples have then been collected at the regular Single Vertical.

MICROFICHE

Sediment data to 1983 are available on microfiche, upon request. The data are stored in station number order by province. There are 270 frames per microfiche at 48X reduction; there is a visible heading showing the fiche number, type of data, province, beginning and ending station number and year of data, and the month/year the fiche was created. The last frame is an index of the contents of that fiche.

F – Flacon d'échantillonnage rempli – Indique qu'au cours de l'analyse en laboratoire on a observé que le flacon d'échantillonnage avait été complètement rempli.

G – Substance organique présente – Indique qu'au cours de l'analyse en laboratoire on a observé qu'une substance organique a été prélevée dans le flacon d'échantillonnage.

Symbole(s) de la verticale unique :

K – Verticale d'échantillonnage à l'extérieur de la verticale unique habituelle à partir de la rive GAUCHE – Indique qu'un échantillon a été prélevé à un endroit à partir de la rive gauche, dans une section transversale, mais à l'extérieur de la verticale unique habituelle.

L – Verticale de mesure des sédiments, à l'extérieur de la section transversale de mesure habituelle à partir de la rive GAUCHE – Indique que les verticales de mesure d'échantillonnage ont été établies à partir de la rive gauche, dans un section transversale à l'extérieur de la section transversale de mesure habituelle.

M – Verticale de mesure des sédiments – Indique que la verticale d'échantillonnage est l'une de plusieurs verticales, en général cinq, et qu'elle représente la dimension d'une tranche. Le débit instantané représente le débit relatif à la dimension d'une tranche.

X – Verticale d'échantillonnage à l'extérieur de la verticale unique habituelle – Indique qu'un échantillon a été prélevé à un endroit, dans une section transversale, mais à l'extérieur de la verticale unique habituelle. L'endroit de la verticale unique habituelle est donné à la fin des données sur les sédiments en suspension instantanés.

Z – Verticale de mesure des sédiments, à l'extérieur de la section transversale de mesure habituelle – Indique qu'une mesure de sédiments en suspension a été prise dans une section transversale à l'extérieur de la section transversale de mesure habituelle.

Note : S'il n'y a pas de symbole, cela indique que les échantillons ont été prélevés à la verticale unique habituelle.

MICROFICHE

Les données jusqu'à 1983 sur les sédiments sont disponibles sur microfiche. Ces données sont emmagasinées par ordre de numéro de station et par province. Chaque microfiche renferme 270 pages réduites de 48X. L'en-tête indique le numéro de la fiche, le genre de données, la province, le numéro de la première et de la dernière station, la première et la dernière année des données ainsi que le mois et l'année de création de la fiche. La dernière image donne l'index de la fiche.

EQUIVALENTS OF MEASURE

The following list of convenient equivalents of measure includes the relationship between imperial units and the International System of Units (SI).

1 inch equals 2.54 cm (centimetres)
1 foot equals 0.3048 m (metre)
1 statute mile equals 1.6093 km (kilometres)

1 cm (centimetre) equals 0.393 70 inch
1 m (metre) equals 3.2808 feet
1 km (kilometre) equals 0.621 37 mile

1 acre equals 43 560 square feet
1 acre equals 0.404 69 ha (hectare)
1 square mile equals 640 acres
1 square mile equals 2.5900 km^2 (square kilometres)
1 square mile equals 259.0 ha (hectares)

1 ha (hectare) equals 10 000 m^2 (square metres)
1 ha (hectare) equals 2.4710 acres
1 km^2 (square kilometre) equals 0.386 10 square mile

1 cubic foot equals 6.2288 imperial gallons
1 imperial gallon equals 4.546 09 L (litres)
1 imperial gallon equals 1.2010 U.S. gallons
1 U.S. gallon equals 0.133 68 cubic foot
1 cubic foot equals 0.028 317 m^3 (cubic metre)
1 m^3 (cubic metre) equals 35.315 cubic feet
1 dam^3 (cubic decametre) equals 1000 m^3 (cubic metres)
1 dam^3 (cubic decametre) equals 1 mm (millimetre) over 1 km^2 (square kilometre)

1 cubic foot per second for one day equals 1.9835 acre-feet
1 cubic foot per second for one day covers one square mile to a depth of 0.037 19 inch
1 acre-foot equals 1.2335 dam^3 (cubic decametres)
1 m^3/s (cubic metre per second) for one day equals 86.4 dam^3 (cubic decametre)
1 m^3/s (cubic metre per second) for one day covers one square kilometre to a depth of 0.0864 m (metre)

1 foot per second equals 0.6818 mile per hour
1 mile per hour equals 1.467 feet per second
1 m/s (metre per second) equals 3.6 km/h (kilometre per hour)
1 km/h (kilometre per hour) equals 0.2778 m/s (metre per second)

1 cubic foot per second equals 0.028 317 m^3/s (cubic metre per second)
1 m^3/s (cubic metre per second) equals 35.315 cubic feet per second

1 pound equals 0.453 59 kg (kilogram)
1 kg (kilogram) equals 2.2046 pounds

1 short ton (2000 pounds) equals 0.907 18 t (tonne)
1 t (tonne) equals 2204.6 pounds

degrees Celsius = 5/9 (degrees Fahrenheit - 32)
degrees Fahrenheit = 9/5 (degrees Celsius) + 32

ÉQUIVALENCES DES UNITÉS DE MESURE

Voici une liste des unités de mesure impériales et leurs équivalences dans le Système international d'unités (SI).

1 pouce vaut 2.54 cm (centimètres)
1 pied vaut 0.3048 m (mètre)
1 mille terrestre vaut 1.6093 km (kilomètre)

1 cm (centimètre) vaut 0.393 70 pouce
1 m (mètre) vaut 3.2808 pieds
1 km (kilomètre) vaut 0.621 37 mille

1 acre vaut 43 560 pieds carrés
1 acre vaut 0.404 69 ha (hectare)
1 mille carré vaut 640 acres
1 mille carré vaut 2.5900 km^2 (kilomètres carrés)
1 mille carré vaut 259.0 ha (hectares)

1 ha (hectare) vaut 10 000 m^2 (mètres carrés)
1 ha (hectare) vaut 2.4710 acres
1 km^2 (kilomètre carré) vaut 0.386 10 mille carré

1 pied cube vaut 6.2288 gallons impérials
1 gallon impérial vaut 4.546 09 L (litres)
1 gallon impérial vaut 1.2010 gallon américain
1 gallon américain vaut 0.133 68 pied cube
1 pied cube vaut 0.028 317 m^3 (mètre cube)
1 m^3 (mètre cube) vaut 35.315 pieds cubes
1 dam^3 (décamètre cube) vaut 1000 m^3 (mètres cubes)
1 dam^3 (décamètre cube) vaut 1 mm (millimètre) qui couvre 1 km^2 (kilomètre carré)

1 pied cube par seconde pendant un jour vaut 1.9835 acre-pied
1 pied cube par seconde pendant un jour couvre un volume d'un mille carré par 0.037 19 pouce
1 acre-pied vaut 1.2335 dam^3 (décamètre cube)
1 m^3/s (mètre cube par seconde) pour un jour vaut 86.4 dam^3 (décamètres cubes)
1 m^3/s (mètre cube par seconde) pour un jour couvre un kilomètre carré à une profondeur de 0.0864 m (mètre)

1 pied par seconde vaut 0.6818 mille par heure
1 mille par heure vaut 1.467 pied par seconde
1 m/s (mètre par seconde) vaut 3.6 km/h (kilomètres par heure)
1 km/h (kilomètre par heure) vaut 0.2778 m/s (mètre par seconde)

1 pied cube par seconde vaut 0.028 317 m^3/s (mètre cube par seconde)
1 m^3/s (mètre cube par seconde) vaut 35.315 pieds cubes par seconde

1 livre vaut 0.453 59 kg (kilogramme)
1 kg (kilogramme) vaut 2.2046 livres

1 tonne courte (2000 livres) vaut 0.907 18 t (tonne)
1 t (tonne) vaut 2204.6 livres

degrés Celsius = 5/9 (degrés Fahrenheit - 32)
degrés Fahrenheit = 9/5 (degrés Celsius) + 32

CO-OPERATION AND ACKNOWLEDGMENTS

Co-operative undertakings with other agencies form an important part of the activities of the Water Survey of Canada. Close co-operation has been maintained with public agencies and private organizations concerned with water resources. Data have been mutually exchanged and suspended sediment collection operations have been facilitated by the assistance received from a number of organizations.

On waters adjacent to the International Boundary, certain sediment stations are maintained by Canada (or the United States) under agreement with the United States (or Canada) and the records are collected and compiled in a manner equally acceptable to both countries. These stations are designated as "International Gauging Stations" in this publication.

For the valuable assistance and co-operation received in obtaining sediment survey records, the Water Survey of Canada is indebted to other federal and provincial organizations which are noted as contributing agencies in the summary for the year. A list of these agencies may be found in the *Sediment Data Reference Index*.

REVISIONS

A number of corrections or revisions have been made to previously published data. Many of these were required because of typographical or computational errors which were exposed when the data were stored on magnetic tape and monthly means were re-calculated by computer. Other errors were discovered or different interpretations of basic data were made during the systematic review of historical streamflow data.

Revisions to daily discharges or sediment data are not published at present. However, those stations where a systematic review has been conducted are identified in the Surface Water Data Reference Index publication. The Historical Streamflow Summary publications contain revisions to monthly and annual mean discharges, and annual extremes of discharge. Revisions, corrections or additions made to discharges and sediment after January 1, 1980, are indicated by an "R" symbol in the data summaries. Detailed information on revisions to historical data is available from the appropriate Regional Chief.

COOPÉRATION ET REMERCIEMENTS

Le travail entrepris en coopération avec d'autres organismes représente une partie importante des activités de la Division des relevés hydrologiques du Canada. On a maintenu une étroite collaboration avec les organismes, publics ou privés, qui s'intéressent aux ressources en eau. On a échangé des données sur les sédiments, et l'assistance fournie par certains organismes a facilité les opérations d'échantillonnage des sédiments en suspension.

Dans les eaux adjacentes à la frontière internationale, les stations dépendent du Canada ou des États-Unis selon l'accord intervenu entre les deux pays, et les relevés sont faits et compilés de façon à satisfaire les deux pays. Ces stations sont nommées «Stations internationales de jaugeage» dans la présente publication.

La Division des relevés hydrologiques du Canada est redevable à plusieurs organismes fédéraux et provinciaux, dont les noms apparaissent dans le sommaire de l'année, de l'aide et de la collaboration qu'ils lui ont apportées pour l'obtention des données sur les sédiments. On trouvera également les noms des organismes qui ont fourni des données dans l'*Index de référence des données sur les sédiments*.

RÉVISIONS

On a corrigé ou révisé des données déjà publiées. Il a été nécessaire d'effectuer plusieurs corrections, car on a relevé des erreurs typographiques ou de calcul lorsqu'on a enregistré les données sur rubans magnétiques et qu'on a recalculé les moyennes mensuelles à l'aide d'un ordinateur. On a aussi relevé d'autres erreurs ou fait des interprétations différentes de certaines données de base au cours de la révision systématique des données historiques sur le débit.

Les corrections apportées aux débits journaliers ou aux données sur les sédiments ne sont pas publiées, du moins pour le moment. Cependant, les stations où on a effectué une révision systématique sont indiquées dans l'*Index de référence des données sur les eaux de surface*. Les publications intitulées *Sommaire chronologique de l'écoulement* contiennent des données révisées sur les débits mensuels et annuels moyens et les extrêmes annuels du débit. Les révisions, corrections ou ajouts apportés aux données sur les débits et sur les sédiments après le 1er janvier 1980 sont indiqués par la lettre R dans les résumés des données. On peut obtenir plus de détails sur les révisions en s'adressant au chef régional concerné.

ABITIBI RIVER AT SMOKAWANA - STATION NO. 04ME003

LOCATION: LAT 50 38 00 N LONG 081 25 00 W
DRAINAGE AREA: 27 500 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: MANUAL

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 30	14:30	4.0	219	231	D48	128	E 489														
NOV 11	09:30		338	231	D49	84	233														

NOTE : SINGLE VERTICAL LOCATED AT 231 METRES FOR 1987

CONCENTRATION SYMBOL(S): E - ORGANIC MATERIAL PRESENT

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1978	------P-----	MANUAL	48	JUL 27	48	JUL 27	---	---	---	---	---	---
1983	----P--P-P--	MANUAL	120	MAY 18	4	AUG 04 *	---	---	---	---	---	---
1986	----P-P-----	MANUAL	81	MAY 7	48	JUL 9	---	---	---	---	---	---
1987	---P------P-	MANUAL	128	APR 30 *	84	NOV 11	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

ALBANY RIVER NEAR HAT ISLAND - STATION NO. 04HA001

LOCATION: LAT 51 19 30 N LONG 083 52 20 W
DRAINAGE AREA: 118 000 km²
TYPE OF FLOW: REGULATED SINCE 1934
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAY 02	14:28	5.0	1270	180	D49	11	1880														
AUG 18	09:00	20.0	1100	180	D49	63	E 408														
OCT 08	13:20	5.0	987	180	SURF	95	E 344														

NOTE : SINGLE VERTICAL LOCATED AT MID (MID STREAM) FOR 1987

CONCENTRATION SYMBOL(S): E - ORGANIC MATERIAL PRESENT

ATTAWAPISKAT RIVER BELOW MUKETEI RIVER - STATION NO. 04FC001

LOCATION: LAT 52 05 30 N LONG 085 00 30 W
DRAINAGE AREA: 36 000 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAY 28	15:00	14.0	472	198	D49	70	436														
SEP 30	18:00	5.0	288	198	SURF	89	343														

NOTE : SINGLE VERTICAL LOCATED AT 200 METRES FOR 1987

ONTARIO

ATTAWAPISKAT RIVER BELOW MUKETEI RIVER - STATION NO. 04FC001

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	SUMMARY : HISTORICAL MEAN LOAD (TONNES)	SUMMARY : STANDARD ERROR OF MEAN %
1975	----PPPP----	MANUAL	20 JUL 05		7 AUG 23		---	---	---	---	---	---
1976	----P-------	MANUAL	11 MAY 30		11 MAY 30		---	---	---	---	---	---
1977	-----P------	MANUAL	10 JUN 04		10 JUN 04		---	---	---	---	---	---
1980	--------P----	MANUAL	80 AUG 13		80 AUG 13		---	---	---	---	---	---
1981	---------P---	MANUAL	70 SEP 30		70 SEP 30		---	---	---	---	---	---
1982	----P----P---	MANUAL	89 MAY 17		7 OCT 18		---	---	---	---	---	---
1983	----P--P-P---	MANUAL	31 OCT 27		1 AUG 08	*	---	---	---	---	---	---
1985	--------P----	MANUAL	81 AUG 20		81 AUG 20		---	---	---	---	---	---
1986	--------P----	MANUAL	52 AUG 3		52 AUG 3		---	---	---	---	---	---
1987	----P---P----	MANUAL	89 SEP 30	*	70 MAY 28		---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

ONTARIO

AUSABLE RIVER NEAR SPRINGBANK - STATION NO. 02FF002

SUSPENDED SEDIMENT FOR 1987

LOCATION: LAT 43 04 20 N LONG 81 39 35 W
DRAINAGE AREA: 865 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

TOTAL SUSPENDED SEDIMENT LOAD 37 000 TONNES FOR THE PERIOD JAN 01 TO DEC 31

REMARKS: OPEN WATER SAMPLING ONLY

	JAN			FEB			MAR			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	11.3	55	53.7	2.21 B	24	4.58	5.80 B	79	39.6	1
2	10.4	52	46.7	2.17 B	25	4.69	49.0 B	182	886	2
3	8.60	48 S	39.8	2.14 B	23	4.25	84.0 B	114	830	3
4	8.00 B	44	30.4	2.11 B	23	4.19	42.5 B	49	180	4
5	7.80 B	42	28.3	2.08 B	22	3.95	35.0 B	41	124	5
6	7.80 B	43	28.2	2.05 B	21	3.72	38.0 B	42	131	6
7	7.41	37	23.7	2.02 B	19	3.33	70.0 B	53	321	7
8	7.27	35	22.0	2.00 B	21	3.83	114	257 S	2 530	8
9	8.94	35	21.0	1.98 B	21	3.59	128	378	4 130	9
10	8.70	31	17.9	1.96 B	22	3.73	98.6	190	1 590	10
11	8.47	35	19.8	1.95 B	24	4.04	89.3	70 S	389	11
12	8.18	33 S	17.8	1.94 B	21	3.52	35.9	42 S	130	12
13	8.81	28	14.1	1.93 B	23	3.84	20.3	32 S	56.1	13
14	8.58	31	14.9	1.92 B	23	3.82	14.7	25	31.8	14
15	11.0	182	173	1.91 B	22	3.83	11.9	19	19.5	15
16	24.7	168	359	1.90 B	22	3.81	10.5	31 S	28.1	16
17	20.0	94	162	1.89 B	19	3.10	10.2	24 S	21.2	17
18	18.4	72	102	1.88 B	22	3.57	10.3	84 S	48.1	18
19	10.5 B	38	35.4	1.87 B	20	3.23	10.8	88	61.6	19
20	7.20 B	37	23.0	1.80 B	18	3.12	11.7	72	72.8	20
21	5.80 B	34	16.2	1.85 B	17	2.88	12.4	80 S	83.6	21
22	4.50 B	31	12.1	2.00 B	20	3.46	12.5	89	84.2	22
23	3.60 B	27	8.40	2.05 B	18	3.19	12.8	82	87.6	23
24	3.20 B	28	7.19	2.10 B	20	3.83	12.4	47 S	50.4	24
25	2.85 B	29	7.14	2.15 B	19	3.53	12.0	48	47.7	25
26	2.70 B	23	5.37	2.20 B	18	3.42	11.7	39	39.4	26
27	2.55 B	23	5.07	2.25 B	20	3.88	11.0	26 S	24.7	27
28	2.48 B	21	4.48	2.30 B	29	5.76	10.4	17	15.3	28
29	2.38 B	24	4.94				9.85	12	9.90	29
30	2.30 B	24	4.77				11.6	39	39.8	30
31	2.25 B	23	4.47				27.6	82	197	31
TOTAL	231.15		1 312.41	58.81		104.87	978.75		11 799.30	TOTAL

	APR			MAY			JUN			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	28.7	35 S	80.7	2.83 E	89	22.5	4.62 E	185	74.5	1
2	28.4	58	132	2.38 E	85 S	19.3	4.88 E	203	85.2	2
3	28.4	44	108	3.28 E	116	32.9	5.58 E	242 S	138	3
4	28.2	39 S	95.0	3.88 E	183	52.2	5.11 E	188	88.5	4
5	41.8	86	354	3.11 E	132	35.5	3.94 E	158	53.8	5
6	79.8	146 S	1 020	1.89 E	107	17.8	3.88 E	188 S	55.4	6
7	68.3	50 S	243	1.72 E	108	15.8	1.88 E	101	15.2	7
8	34.5	42	125	1.80 E	103	16.0	0.830 E	52	4.15	8
9	20.8	48	86.1	1.13 E	97 S	9.47	3.14 E	134	36.4	9
10	14.9	111 S	143	0.869 E	76	4.61	3.98 E	148 S	50.6	10
11	11.8	126	126	0.588 E	40	2.03	2.89 E	110	24.8	11
12	11.1	127	122	1.61 E	42 S	5.84	0.898 E	65	5.04	12
13	17.2	152 S	226	1.98 E	82 S	14.1	0.821 E	97 S	5.20	13
14	18.4	131	186	1.05 E	81	7.35	0.398 E	47	1.49	14
15	18.0	138	192	1.81 E	105	16.4	0.386 E	81	1.81	15
16	13.8	128	150	1.75 E	85 S	12.8	0.908 E	119 S	9.34	16
17	11.6	110 S	110	0.833 E	36	2.73	0.781 A	120 S	8.10	17
18	9.77	105	88.6	1.28 E	86	9.10	0.800 E	114	8.91	18
19	8.33	101	72.7	1.76 E	87 S	8.77	0.820 E	111	8.83	19
20	7.38 E	98	80.2	2.53 E	93	20.3	0.490 E	110 S	4.98	20
21	8.48 E	88	53.8	1.74 E	88	10.2	0.498 E	105	4.52	21
22	5.75 E	85	47.2	0.737 E	37	2.38	0.800 E	86	3.72	22
23	5.31 E	82	42.2	1.85 E	83 S	10.8	0.505 E	83 S	2.78	23
24	8.11 E	108	87.0	3.52 E	132	40.1	0.840 E	83	2.94	24
25	5.88 E	115 S	58.2	2.90 E	134	33.8	0.820 E	89	3.10	25
26	4.78 E	107	44.2	1.37 E	73 S	8.64	0.500 E	83 S	3.59	26
27	3.86 E	81	26.8	1.10 A	89 S	6.58	0.820 E	86	3.86	27
28	4.08 E	88	33.8	0.502 E	53	2.30	0.580 E	78	3.98	28
29	2.78 E	88 S	21.2	0.388 E	57	1.91	0.580 E	89	3.48	29
30	3.65 E	87	27.4	0.302 E	105 S	2.74	0.570 E	88 S	3.25	30
31				8.72 E	357	269				31
TOTAL	528.82		4 133.8	51.259		710.21	52.122		709.90	TOTAL

A - MANUAL GAUGE B - ICE CONDITIONS E - ESTIMATED S - SAMPLE(S) COLLECTED THIS DAY

ONTARIO

AUSABLE RIVER NEAR SPRINGBANK - STATION NO. 02FF002

SUSPENDED SEDIMENT FOR 1987

DAY	JUL DAILY DISCHARGE (m^3/s)	JUL MEAN CONCENTRATION (mg/L)	JUL DAILY LOAD (t)	AUG DAILY DISCHARGE (m^3/s)	AUG MEAN CONCENTRATION (mg/L)	AUG DAILY LOAD (t)	SEP DAILY DISCHARGE (m^3/s)	SEP MEAN CONCENTRATION (mg/L)	SEP DAILY LOAD (t)	DAY
1	0.580 E	78	3.81	0.407 E	145 S	5.10	1.55 E	127 S	17.0	1
2	0.570 E	87	4.28	0.478 E	142	5.84	1.59 E	118	15.9	2
3	0.540 E	95	4.43	0.487 E	108	4.19	2.49 E	148	32.1	3
4	0.500 E	93 S	4.02	0.715 E	125	7.72	2.05 E	150	26.7	4
5	0.540 E	94	4.39	0.881 E	189 S	15.7	1.22 E	105 S	11.1	5
6	0.600 E	95	4.92	0.983 E	181	13.7	0.852 E	87	6.40	6
7	0.580 E	93	4.74	0.588 E	88	4.30	0.495 E	80	3.43	7
8	0.520 E	91 S	4.08	0.885 E	108 S	8.07	0.241 E	83 S	1.73	8
9	0.600 E	102	5.29	0.954 E	122	10.1	0.308 E	85	1.72	9
10	0.850 E	131	10.8	1.08 E	140	13.1	0.899 E	118	7.01	10
11	2.80 E	183 S	36.8	1.12 E	161 S	15.6	0.857 E	122	9.03	11
12	1.35 E	166	19.4	0.810 E	184	12.9	0.859 E	100 S	7.42	12
13	1.02 E	196	17.2	0.382 E	75	2.54	1.01 E	131	11.4	13
14	0.870 E	227 S	17.1	0.524 A	127 S	5.75	0.880 A	94	8.52	14
15	0.700 E	223	13.5	0.148 E	88	0.87	0.859	102 S	8.81	15
16	0.605 E	217	11.3	0.058 E	20	0.10	0.801	98	4.98	16
17	0.551 A	207 S	9.85	0.120 E	21	0.22	0.849	103	5.78	17
18	0.500 E	187 S	7.21	0.445 E	108 S	4.15	0.724	97	6.07	18
19	0.481 E	148	6.15	0.585 E	133	6.49	0.719	87 S	5.40	19
20	0.459 E	119	4.72	1.03 E	189	15.0	0.619	79	4.23	20
21	0.441 E	100 S	3.81	1.05 E	176	15.9	0.627	81	4.38	21
22	0.420 E	105	3.81	0.688 E	161 S	9.57	0.726	97 S	6.10	22
23	0.384 E	106	3.51	1.58 E	199	28.9	0.841	93	6.15	23
24	0.380 E	133	4.37	2.47 E	235	50.2	0.592	83	4.51	24
25	0.438 E	189 S	8.02	2.33 E	202 S	40.7	0.528	83	3.78	25
26	0.431 E	158	5.88	2.76 E	204	48.6	0.491	77 S	3.27	26
27	0.422 E	145	5.29	2.89 E	142	35.5	0.519	81	3.83	27
28	0.402 E	137 S	4.41	2.80 E	97	23.5	0.471	73	2.97	28
29	0.387 E	121	4.15	2.54 E	115 S	25.2	0.455	80 S	3.14	29
30	0.407 E	122	4.28	1.71 E	72	10.8	0.480	87	3.68	30
31	0.412 E	123	4.38	0.932 E	84	5.15				31
TOTAL	18.870		243.82	34.626		465.28	24.624		229.38	TOTAL

DAY	OCT DAILY DISCHARGE (m^3/s)	OCT MEAN CONCENTRATION (mg/L)	OCT DAILY LOAD (t)	NOV DAILY DISCHARGE (m^3/s)	NOV MEAN CONCENTRATION (mg/L)	NOV DAILY LOAD (t)	DEC DAILY DISCHARGE (m^3/s)	DEC MEAN CONCENTRATION (mg/L)	DEC DAILY LOAD (t)	DAY
1	0.556	89	4.28	7.40	213	136	28.8	90	225	1
2	0.625	92	4.97	5.42	134	62.8	25.6	90	199	2
3	0.768	87 S	5.93	4.01	100	34.8	22.8	88	174	3
4	0.928	109	8.75	3.13	88	23.3	20.3	87	153	4
5	0.759	103	6.75	2.88	80	18.8	17.6	82	124	5
6	0.642	81	4.49	2.68	71	15.2	15.2	77	101	6
7	0.550	69	3.28	2.32	62	12.4	13.7	88	78.1	7
8	0.885	96	7.37	2.52	59	12.8	13.2	70	79.6	8
9	1.75	186	28.1	7.75	127	85.0	67.1	248	1 010	9
10	1.23	108	11.3	16.1	194	270	59.4	130	667	10
11	1.11	95	9.11	15.2	84	110	34.6	83	188	11
12	0.955	82	6.77	11.2	53	51.3	27.7	93	223	12
13	0.750	69	4.47	7.84	42	28.4	25.6	70	156	13
14	0.652	70	3.84	5.66	33	18.1	20.5	22 S	38.0	14
15	0 605	94	3.35	4.23	33	12.1	29.4	78	201	15
16	0.552	61	2.81	3.29	29	8.24	72.3	125	781	16
17	0.536	58	2.68	2.70	24	5.60	54.9	43	204	17
18	0.533	58	2.67	2.43	25	5.25	40.1	19	65.6	18
19	0.532	58	2.67	2.24	25	4.84	27.1	17	39.8	19
20	0.548	85	3.07	2.12	24	4.60	46.6	39	157	20
21	0.537	57	2.84	2.18	28	4.83	111	117	1 120	21
22	0.536	58	2.58	2.11	27	4.92	91.7	89	547	22
23	0.550	59	3.01	2.07	27	4.83	82.5	52	281	23
24	0.895	70	5.41	9.59	83	52.2	38.2	44	136	24
25	4.78	200	82.8	40.6	172	603	31.0	40	107	25
26	5.88	210	121	120	320	3 320	48.7	82	345	26
27	5.39	182	82.6	121	189	1 770	35.3	45	137	27
28	10.2	338	298	80.3	109	785	24.6	41	87.8	28
29	10.4	218	196	47.4	88	405	17.5	37	55.8	29
30	11.2	344	333	38.0	93	305	8.80 E	30	17.8	30
31	9.88	350	288				4.70 E	23	8.34	31
TOTAL	77.487		1 851.82	573.75		8 140.71	1 109.80		7 611.24	TOTAL

A - MANUAL GAUGE B - ICE CONDITIONS E - ESTIMATED S - SAMPLE(S) COLLECTED THIS DAY

AUSABLE RIVER NEAR SPRINGBANK - STATION NO. 02FF002

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)		SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JAN 02	14:00	2.0	8.43		12.0	DH59	48															
JAN 12	14:20	1.0	5.04		12.0	DH59	33															
MAR 08	14:30	0.1	123		12.0	DH59	247	188														
MAR 11	15:00	0.1	61.0		12.0	DH59	61															
MAR 12	15:30	0.1	32.5		12.0	DH59	39															
MAR 13	16:00	0.1	18.5		12.0	DH59	34															
MAR 16	15:10	0.1	10.4		12.0	DH59	42															
MAR 17	12:30	1.0	10.1		12.0	DH59	17															
MAR 18	15:20	4.0	10.1		12.0	DH59	67															
MAR 21	14:30	5.0	12.1		12.0	DH59	42															
MAR 24	15:00	10.0	12.1		12.0	DH59	42															
MAR 27	15:45	9.0	10.9		12.0	DH59	25															
APR 01	15:00	9.0	26.3		12.0	DH59	32	383														
APR 04	15:20	9.0	28.4		12.0	DH59	26															
APR 06	13:15	5.0	17.2		12.0	DH59	102															
APR 07	10:30	5.0	57.6		12.0	DH59	48															
APR 10	15:30	11.0	14.9	H	12.0	DH59	131															
APR 13	15:30	10.0	17.2	H	12.0	DH59	137	347														
APR 17	15:00	13.0	11.4		12.0	DH59	111															
APR 25	15:20	14.0	5.96	Y	12.0	DH59	109															
APR 29	18:00	13.0	2.78	Y	12.0	DH59	86															
MAY 02	10:20	12.0	2.35	Y	12.0	DH59	97															
MAY 06	14:15	15.0	1.89	Y	12.0	DH59	104															
MAY 09	15:15	19.0	1.13	Y	12.0	DH59	101	332														
MAY 13	09:00	12.0	1.89	Y	12.0	DH59	86															
MAY 16	10:30	17.0	1.75	Y	12.0	DH59	86															
MAY 19	16:10	18.0	1.78	Y	12.0	DH59	52															
MAY 23	16:30	21.0	1.95	Y	12.0	DH59	74															
MAY 26	16:00	20.0	1.37	Y	12.0	DH59	63	383														
MAY 27	08:20	18.0	1.10		12.0	DH59	75															
MAY 30	10:00	28.0	0.302	Y	12.0	DH59	107															
JUN 03	18:50	23.0	6.58	Y	12.0	DH59	194	408														
JUN 06	17:00	22.0	3.85	Y	12.0	DH59	148															
JUN 10	16:40	22.0	3.95	Y	12.0	DH59	91															
JUN 13	11:30	24.0	0.621	Y	12.0	DH59	101															
JUN 16	15:00	27.0	0.908	Y	12.0	DH59	100															
JUN 17	13:30	27.0	0.781		12.0	DH59	116															
JUN 20	16:15	28.0	0.490	Y	12.0	DH59	111															
JUN 23	18:00	27.0	0.505	Y	12.0	DH59	82															
JUN 26	14:30	26.0	0.800	Y	12.0	DH59	86															
JUN 30	18:00	25.0	0.570	Y	12.0	DH59	87															
JUL 04	16:00	24.0	0.500	Y	12.0	DH59	94															
JUL 08	15:30	29.0	0.520	Y	12.0	DH59	92															
JUL 11	10:00	27.0	2.80	Y	12.0	DH59	167	346														
JUL 14	14:45	25.0	0.551		12.0	DH59	230															
JUL 17	10:00	29.0	0.551	Y	12.0	DH59	212															
JUL 18	16:15	27.0	0.500	Y	12.0	DH59	180															
JUL 21	19:15	31.0	0.441	Y	12.0	DH59	99	349														
JUL 25	10:30	27.0	0.438	Y	12.0	DH59	151															
JUL 28	14:30	25.0	0.402	Y	12.0	DH59	127															
AUG 01	16:00	25.0	0.407	Y	12.0	DH59	156															
AUG 05	09:00	24.0	0.981	Y	12.0	DH59	194	378														
AUG 08	16:30	24.0	0.855	Y	12.0	DH59	115															
AUG 11	18:00	25.0	1.12	Y	12.0	DH59	138															
AUG 14	08:00	25.0	0.524		12.0	DH59	127															
AUG 18	15:15	27.0	0.445	Y	12.0	DH59	107															
AUG 22	14:45	24.0	0.888	Y	12.0	DH59	160															
AUG 25	14:10	20.0	2.33	Y	12.0	DH59	104															
AUG 29	19:15	20.0	2.54	Y	12.0	DH59	98															
SEP 01	15:15	19.0	1.55	Y	12.0	DH59	115															
SEP 05	10:00	18.0	1.22	Y	12.0	DH59	108															
SEP 08	17:00	25.0	0.241	Y	12.0	DH59	74															
SEP 12	16:00	20.0	0.859	Y	12.0	DH59	94															
SEP 15	16:40	20.0	0.687		12.0	DH59	108															
SEP 19	10:00	16.0	0.798		12.0	DH59	88															
SEP 22	16:30	19.0	0.895		12.0	DH59	99	298														
SEP 26	18:00	16.0	0.463		12.0	DH59	75															
SEP 29	16:00	18.0	0.434		12.0	DH59	84															
OCT 03	15:50	13.0	0.755		12.0	DH59	85															
DEC 14	10:30	3.0	20.7		12.0	DH59	17															

NOTE : SINGLE VERTICAL LOCATED AT 12 METRES FOR 1987

DISCHARGE SYMBOL(S): H - DAILY MEAN Y - DAILY MEAN; MANUAL GAUGE E - DAILY MEAN; ESTIMATED

ONTARIO

AUSABLE RIVER NEAR SPRINGBANK - STATION NO. 02FF002

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : JAN-DEC MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1970	CCCCCCCCCCCC	MANUAL	988	MAY 16	11	JAN 27	4 520	MAY 18	35 200	96.3	96.3	---
1971	PPPCCCCCCCCC	MANUAL	236	AUG 27	18	DEC 21	887	APR 02	7 480	---	---	---
1972	CCCCCCCCCCCC	MANUAL	827	APR 17	20	FEB 22	7 780	APR 17	41 000	112	104	7.5
1973	CCCCCCCCCCCC	MANUAL	955	MAR 11	18	NOV 10	7 870	JAN 01	55 800	180	128	19.9
1974	CCCCCCCCCCCC	MANUAL	1 220	APR 04	12	DEC 20	15 200	MAR 05	93 800 *	256	161	22.7
1975	CCCCCCCCCCCC	MANUAL	1 480	APR 19	11	JAN 20	18 700	APR 19	75 200	206	170	17.4
1976	CCCCCCCCCCCC	MANUAL	804	JUL 10	22	DEC 08	5 220	MAR 06	65 500	178	172	14.1
1977	CCCCCCCCCCCC	MANUAL	848	JUN 29	43	MAR 23	6 600	MAR 13	65 500	178	173	11.8
1978	CCCCCCCCCCCC	MANUAL	414	APR 11	31	MAR 28	4 180	APR 02	39 400	108	165	11.6
1979	CCCCCCCCCCCC	MANUAL	1 550	APR 14	24	DEC 29	33 200	APR 14 *	92 900	255	175	11.4
1980	CCCCCCCCCCCC	MANUAL	758	JUN 29	19	FEB 05	5 890	MAR 22	41 500	113	188	11.2
1981	CCCCCCCCCCCC	MANUAL	890	SEP 02	11	DEC 30	4 200	SEP 02	41 300	113	183	10.8
1982	CCCCCCCCCCCC	MANUAL	1 630	MAR 31 *	8	JAN 20	18 700	MAR 31	65 700	180	185	9.9
1983	CCCCCCCCCCCC	MANUAL	712	APR 10	7	JAN 09 *	3 850	MAY 03	28 800	81.2	158	10.3
1984	CCCCCCCCCCCC	MANUAL	770	MAR 16	7	JAN 27	4 330	MAR 17	42 900	117	155	9.9
1985	CCCCCCCCCCCC	MANUAL	803	SEP 8	8	JAN 24	3 940	FEB 25	45 200	124	153	9.5
1986	CCCCCCCCCCCC	MANUAL	1 170	JUN 12	8	JAN 11	3 480	SEP 12	52 200	143	153	8.9
1987	CCCCCCCCCCCC	MANUAL	247	MAR 8	17	MAR 17	4 130	MAR 08	37 000	101	150	8.7

MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

BAYFIELD RIVER NEAR VARNA - STATION NO. 02FF007

LOCATION: LAT 43 33 03 N LONG 081 35 22 W
DRAINAGE AREA: 488 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)		TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 30	13:10	5.0	18.3	24.0		DH59	105	443														
APR 28	10:28	10.0	1.48	15.0	X	DH48	16	278														
MAY 08	14:45	9.0	1.10	15.0	X	DH48	4	262														
MAY 28	13:55	18.0	0.808	15.0	X	DH48	13	311														
JUL 27	14:20	18.0	0.153	15.0	X	DH48	8	244														
AUG 26	14:05	16.0	0.051	15.0	X	DH48	8	331														
SEP 16	15:30	16.0	0.100	15.0	X	DH48	8	347														
OCT 07	08:12	12.0	0.140	15.0	X	DH48	11	322														
NOV 02	14:15	7.0	1.57	15.0	X	DH48	5	470														
DEC 17	10:50	2.0	21.0	24.0		DH59	12	383														

NOTE : SINGLE VERTICAL LOCATED AT 24 METRES FOR 1987

VERTICAL SYMBOL(S): X - NOT AT REGULAR SINGLE SAMPLE VERTICAL

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	---PPP-PP-PP	MANUAL	52	DEC 3	8	MAY 21	---	---	---	---	---	---
1986	P-P-PPP--PP-	MANUAL	414	MAR 18 *	3	JAN 10 *	---	---	---	---	---	---
1987	--PPP-PPPPPP	MANUAL	105	MAR 30	4	MAY 8	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

BEAR CREEK BELOW BRIGDEN - STATION NO. 02EC009

LOCATION: LAT 42 48 42 N LONG 082 17 54 W
DRAINAGE AREA: 533 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MARCH 1986

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	PERCENT SILT	PERCENT CLAY
MAR 18	11:30		2.58	3.5 X	DH48	40	525														
APR 07	16:00	5.0	33.5	24.0	DH59	233	385														
MAY 28	11:00	17.0	0.284	3.5 X	DH48	195	925														
JUL 16	12:15		0.151	3.5 X	DH48	98	1740														
AUG 11	11:45	24.0	0.199	3.5 X	DH48	222	1130														
SEP 15	10:30		0.176	3.5 X	DH48	115	2540														
OCT 19	13:45	12.0	0.311	3.5 X	DH48	128	1030														
NOV 02	12:05		3.00	3.5 X	DH48	98	843														

NOTE : SINGLE VERTICAL LOCATED AT 24 METRES FOR 1987

VERTICAL SYMBOL(S): X - NOT AT REGULAR SINGLE SAMPLE VERTICAL

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	SUMMARY : HISTORICAL MEAN LOAD (TONNES)	SUMMARY : STANDARD ERROR OF MEAN %
1986	--PPPPP-PPP-	MANUAL	184 JUN 24	28 NOV 5 *	--- ---	---	---	---	---
1987	--PPP-PPPPP-	MANUAL	233 APR 7 *	40 MAR 18	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

BEAVER RIVER NEAR CLARKSBURG - STATION NO. 02FB009

LOCATION: LAT 44 31 20 N LONG 080 28 00 W
DRAINAGE AREA: 572 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: STATION STARTED MAR 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	PERCENT SILT	PERCENT CLAY
MAR 17	10:55	0.5	9.61	10.0	DH48	4	412														
APR 07	10:50	3.0	32.8	10.0	DH59	15	244														
MAY 05	11:00	8.0	5.44	10.0	DH48	8	384														
MAY 25	14:45	10.0	4.85	10.0	DH48	4	314														
JUN 09	09:15	15.0	4.57	10.0	DH48	11															
JUL 29	10:15	22.0	2.57	10.0	DH48	18	307														
SEP 10	10:10	18.0	1.73	10.0	DH48	12	318														
OCT 13	10:05	10.0	2.08	10.0	DH48	17	288														
NOV 30	11:05	2.0	18.3	10.0	DH59	38	168														

NOTE : SINGLE VERTICAL LOCATED AT 10 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	SUMMARY : HISTORICAL MEAN LOAD (TONNES)	SUMMARY : STANDARD ERROR OF MEAN %
1987	--PPPPP-PPP-	MANUAL	38 NOV 30 *	4 MAR 17 *	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

ONTARIO

BIG CREEK NEAR WALSINGHAM - STATION NO. 02GC007

LOCATION: LAT 42 41 05 N LONG 080 32 15 W
DRAINAGE AREA: 591 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JAN 03	14:23	3.0	8.95	12.0	DH59	58															
JAN 06	18:20	3.0	8.34	12.0	DH59	130															
JAN 12	17:10	3.0	8.11	12.0	DH59	35															

NOTE : SINGLE VERTICAL LOCATED AT 12 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : JAN-DEC MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1986	-PP-PCCCCCCC	MANUAL	315	DEC 08	10	JUL 26	587	DEC 10	5 180	---	---	---
1987	CCCCCCCCCCCC	MANUAL	535	JUN 29	29	OCT 11	888	APR 03	24 100	85.9	85.9	---
1988	CCCCCCCCCCCC	MANUAL	981	AUG 06	15	NOV 09	1 680	FEB 04	28 300	77.4	71.7	8.0
1989	CCCCCCCCCCCC	MANUAL	498	JAN 24	2	OCT 07	2 790	FEB 01	31 800	87.4	78.9	8.1
1970	CCCCCCCCCCCC	DUAL	277	DEC 04	8	JAN 26	340	APR 03	11 700	32.2	85.7	18.3
1971	CCCCCCCCCCCC	MANUAL	315	MAR 07	2	OCT 18	688	FEB 28	13 400	36.6	59.9	18.3
1972	CCCCCCCCCCCC	MANUAL	484	MAR 01	7	FEB 24	1 520	MAR 02	20 800	58.9	58.4	15.1
1973	CCCCCCCCCCCC	MANUAL	452	MAR 05	4	OCT 12	1 150	MAR 14	22 400	61.4	58.7	12.7
1974	CCCCCCCCCCCC	MANUAL	452	MAY 12	1	SEP 25 *	1 500	JAN 28	27 900	78.5	61.8	11.1
1975	CCCCCCCCCCCC	MANUAL	533	FEB 24	9	JAN 19	858	MAR 22	22 000	80.3	61.8	9.8
1976	CCCCCCCCCCCC	MANUAL	404	FEB 16	8	SEP 23	2 780	MAR 08	26 900	78.9	63.4	9.0
1977	CCCCCCCCCCCC	MANUAL	1 630	SEP 26	12	JAN 25	3 880	SEP 26 *	33 800	92.6	66.0	8.6
1978	CCCCCCCCCCCC	MANUAL	887	MAY 13	15	FEB 27	878	MAR 22	26 800	72.8	66.6	8.0
1979	CCCCCCCCCCCC	MANUAL	347	APR 14	11	SEP 28	2 510	MAR 05	30 400	83.3	67.9	7.5
1980	CCCCCCCCCCCC	MANUAL	1 880	JUL 22	8	NOV 15	3 040	JUL 22	26 300	71.8	68.2	8.9
1981	CCCCCCCCCCCC	MANUAL	784	JUN 22	7	DEC 10	1 150	FEB 18	20 500	56.1	67.4	8.6
1982	CCCCCCCCCCCC	MANUAL	1 880	MAY 28 *	3	OCT 29	2 540	MAY 28	42 800 *	117	70.5	7.4
1983	CCCCCCCCCCCC	MANUAL	741	FEB 03	2	OCT 21	1 250	FEB 03	23 300	63.9	70.1	7.0
1984	CCCCCCCCCCCC	MANUAL	448	FEB 13	9	OCT 19	1 880	FEB 14	24 100	66.0	69.8	6.6
1985	CCCCCCCCCCCC	MANUAL	1 840	MAY 31	5	AUG 8	1 920	FEB 28	28 500	80.5	70.4	6.3
1986	CCCCCCCCCCCC	MANUAL	404	MAR 11	10	OCT 31	890	OCT 04	22 800	82.5	70.0	6.0
1987	P----------	MANUAL	130	JAN 6	35	JAN 12	---	---	---	---	---	---

DUAL - MANUAL AND AUTOMATIC SAMPLING MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

BIG OTTER CREEK NEAR CALTON - STATION NO. 02CC026

SUSPENDED SEDIMENT FOR 1987

LOCATION: LAT 42 42 30 N LONG 80 50 30 W
DRAINAGE AREA: 676 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

TOTAL SUSPENDED SEDIMENT LOAD 90 500 TONNES FOR THE PERIOD JAN 01 TO DEC 31

REMARKS:OPEN WATER SAMPLING ONLY

	JAN			FEB			MAR			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	11.4	190	187	5.80 B	88	31.4	11.2 B	645	624	1
2	10.8	171	160	5.40 B	81	28.5	35.0 B	2 810	7 890	2
3	10.3	155	138	5.24 B	58	26.3	35.1	1 440	4 370	3
4	9.03	139	108	5.10 B	58	24.7	22.1	815 S	1 550	4
5	9.25	162	130	5.00 B	57	24.6	15.5	488	851	5
6	9.44	189	154	4.90 B	58	24.8	13.5	438 S	503	6
7	9.17	171	135	4.80 B	55	22.8	21.3	782	1 350	7
8	8.81	151	115	4.75 B	57	23.4	39.0	1 770	5 880	8
9	8.43	144	105	4.70 B	57	23.1	47.3	2 210	9 030	9
10	8.47	153	112	4.55 B	78	30.7	37.5	1 980	6 320	10
11	8.71	159	120	4.45 B	90 S	34.8	21.7	1 020	1 910	11
12	8.27	151	108	4.40 B	82	31.2	18.4	644 S	828	12
13	7.88	165 S	98.7	4.38 B	89	28.1	11.7	248	248	13
14	7.88	147	99.8	4.25 B	83	19.5	8.85	212	180	14
15	18.5	309	441	4.20 B	39	14.2	8.84	197	180	15
16	25.2	432	841	4.10 B	46	18.3	8.14	196	138	16
17	21.1	295	540	4.05 B	52	18.2	7.72	177	118	17
18	14.7	217	275	4.00 B	41	14.2	7.54	161	105	18
19	11.6	169 S	169	3.95 B	38	13.3	7.52	152 S	98.8	19
20	9.50 B	174	148	3.90 B	40	13.5	7.55	150	88.0	20
21	8.80 B	173	132	3.90 B	38	12.8	7.88	159	108	21
22	8.40 B	161	102	3.85 B	41	13.6	7.71	167	111	22
23	7.90 B	102	89.8	3.82 B	43	14.2	7.70	148	98.5	23
24	7.50 B	88	57.0	3.80 B	40	13.1	7.70	127	84.5	24
25	7.10 B	78	48.5	3.78 B	37	12.1	7.91	122 S	83.4	25
26	6.90 B	73	43.5	3.72 B	39	12.5	9.13	209	185	26
27	6.70 B	71	41.1	3.70 B	40	12.8	10.1	298	258	27
28	6.40 B	88	37.6	3.70 B	51	16.3	10.1	273	238	28
29	6.10 B	67	35.3				9.20	208	184	29
30	5.90 B	65	33.1				10.5	244	221	30
31	5.70 B	66	32.5				17.6	575	874	31
TOTAL	303.63		4 915.7	121.99		588.8	489.80		64 071.2	TOTAL

	APR			MAY			JUN			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	21.0	638	1 160	5.28	100	45.6	3.23	98	18.5	1
2	23.3	855 S	1 720	5.09	89 S	39.1	3.37	88	19.8	2
3	25.0	450	972	4.98	85	41.0	3.80	145	47.6	3
4	25.3	358	776	4.82	88	35.8	3.48	129	38.8	4
5	47.1	850	3 870	4.71	86	35.0	3.28	101 S	28.8	5
6	66.7	1 350 S	7 780	4.61	82	32.7	3.18	91	24.8	6
7	57.4	488	2 480	4.51	83	32.3	3.13	88	24.0	7
8	37.3	388	857	4.40	84	31.8	3.13	78	21.4	8
9	25.1	308	447	4.38	95	35.8	3.26	98	27.0	9
10	17.8	188	287	4.28	93 S	34.5	3.07	84	22.3	10
11	14.2	158	191	4.21	88	32.0	2.88	81	20.8	11
12	15.7	287	403	4.13	88	31.4	3.24	121	33.8	12
13	22.0	482	918	4.04	83	29.0	3.34	150	43.3	13
14	20.3	405 S	710	4.07	88	30.9	3.21	178	48.6	14
15	16.2	316	442	5.08	195	85.8	2.84	152	38.6	15
16	13.6	225	282	4.30	117	43.5	2.83	139	34.0	16
17	11.7	178	181	4.05	91	31.8	2.67	133 S	30.7	17
18	10.3	164	146	4.04	100	34.9	2.88	158	38.3	18
19	9.13	161	127	4.12	120	42.7	2.88	143	31.8	19
20	8.24	149	106	4.10	107	37.8	2.48	144	30.8	20
21	7.80	135	88.8	3.98	97	33.4	2.41	137	28.5	21
22	7.00	131	79.2	3.88	90	30.2	3.63	284	67.8	22
23	6.88	141	81.0	3.77	80 S	26.1	4.20	303	110	23
24	6.85	150	88.2	3.88	81	25.8	3.78	239 S	78.1	24
25	5.15	136	72.3	3.82	88	27.5	3.39	194	55.8	25
26	5.81	129	84.8	3.81	87 S	27.1	3.58	245	75.6	26
27	5.70	125 S	61.6	3.58	82	25.4	3.84	318	108	27
28	5.81	154	78.8	3.45	82	24.4	3.61	238	72.2	28
29	5.77	141	70.3	3.34	75	21.9	3.82	255	84.2	29
30	5.58	127	61.0	3.78	70 S	18.8	3.42	223	65.9	30
31				3.19	81	16.8				31
TOTAL	550.17		23 928.6	126.57		1 041.8	97.45		1 388.3	TOTAL

B - ICE CONDITIONS

S - SAMPLE(S) COLLECTED THIS DAY

ONTARIO

BIG OTTER CREEK NEAR CALTON - STATION NO. 02GC025

SUSPENDED SEDIMENT FOR 1987

DAY	JUL DAILY DISCHARGE (m^3/s)	JUL MEAN CONCENTRATION (mg/L)	JUL DAILY LOAD (t)	AUG DAILY DISCHARGE (m^3/s)	AUG MEAN CONCENTRATION (mg/L)	AUG DAILY LOAD (t)	SEP DAILY DISCHARGE (m^3/s)	SEP MEAN CONCENTRATION (mg/L)	SEP DAILY LOAD (t)	DAY
1	3.31	209	59.8	1.45	18	2.27	2.61	71	16.0	1
2	3.35	186	48.0	2.10	117	21.2	2.32	83	12.6	2
3	3.36	141	40.9	3.88	290 S	93.2	2.24	80	11.6	3
4	3.38	146 S	42.8	2.84	108	24.8	2.12	48	8.78	4
5	3.30	152	43.3	2.27	84	16.4	2.08	40	7.19	5
6	3.30	150	42.8	2.10	74	13.4	2.11	40	7.29	6
7	3.48	154	46.0	2.07	50	8.84	2.18	34	6.35	7
8	3.63	175	54.9	1.88	42	7.22	2.18	34	6.40	8
9	3.95	183	65.5	3.80	180	49.6	2.22	28 S	5.81	9
10	4.80	200	82.9	4.61	281	112	2.22	51	9.78	10
11	5.13	318	187	3.08	144	38.3	2.17	44	8.25	11
12	6.78 A	333	195	2.82	107	24.2	2.22	43	8.25	12
13	5.08 E	178	76.1	2.62	84	19.7	2.34	56	11.3	13
14	4.88 E	180	76.6	2.38	84	17.3	2.35	53 S	10.6	14
15	2.78 A	83 S	19.9	2.33	82	16.5	2.41	58	12.1	15
16	2.25	81	11.8	2.20	77	14.6	2.52	69	15.0	16
17	2.12	88 S	12.1	2.12	76	14.3	2.77	80	19.1	17
18	1.83	84	10.7	2.13	87	12.3	3.31	167	47.8	18
19	1.78	81	9.38	2.04	85	12.0	2.74	116	27.9	19
20	1.74	83	9.47	1.87	84	10.9	2.60	102	22.8	20
21	1.72	71	10.6	1.81	55	9.06	2.60	77	17.3	21
22	1.88	61 S	8.83	2.10	61	11.1	2.68	68 S	15.8	22
23	1.41	27	3.28	2.04	65	11.5	2.75	70	16.7	23
24	1.31	28	3.17	2.00	80	10.4	2.61	81	13.2	24
25	1.30	33	3.71	2.03	46 S	8.07	2.35	58	11.8	25
26	1.53	35	4.63	2.13	58	10.7	2.28	46	9.45	26
27	1.44	38	4.73	3.00	123	31.8	2.27	42	8.24	27
28	1.41	38	4.38	3.02	104	27.1	2.31	34	6.78	28
29	1.40	31	3.76	2.87	55	12.7	2.44	33	6.96	29
30	1.38	38	4.47	2.48	45	8.88	2.55	30 S	6.81	30
31	1.38	21 S	2.80	2.66	51 S	11.3				31
TOTAL	86.84		1 189.42	75.78		684.06	72.84		380.37	TOTAL

DAY	OCT DAILY DISCHARGE (m^3/s)	OCT MEAN CONCENTRATION (mg/L)	OCT DAILY LOAD (t)	NOV DAILY DISCHARGE (m^3/s)	NOV MEAN CONCENTRATION (mg/L)	NOV DAILY LOAD (t)	DEC DAILY DISCHARGE (m^3/s)	DEC MEAN CONCENTRATION (mg/L)	DEC DAILY LOAD (t)	DAY
1	2.48	28	5.50	3.04	69	18.1	10.3	180	180	1
2	2.44	36	7.58	3.00	69 S	15.3	8.28	128 S	91.2	2
3	2.51	32	6.94	3.02	64	16.7	8.71	104 S	80.3	3
4	2.47	26	5.55	3.00	66	17.1	8.13	88	62.4	4
5	2.40	24	4.88	2.87	53	13.1	5.85	90	43.2	5
6	2.50	23 S	4.97	2.90	72	18.0	5.10	84	37.0	6
7	2.58	18 S	4.20	3.04	80	21.0	4.78	80	33.1	7
8	2.58	24	5.35	3.11	86	23.1	4.70	78	32.1	8
9	2.48	25	5.38	3.99	185	58.8	5.77	125	62.3	9
10	2.47	32	6.83	3.83	106	34.7	7.84	156	103	10
11	2.84	48	10.9	3.43	58 S	16.6	8.04	134	93.1	11
12	2.88	80	13.9	3.31	46	13.7	8.84	175	134	12
13	2.83	48	10.5	3.16	42	11.5	8.88	148	111	13
14	2.81	48 S	10.4	3.06	39	10.3	7.83	86 S	58.7	14
15	2.48	43	9.26	3.08	41	10.8	11.1	231	280	15
16	2.80	48	10.8	2.90	43	10.8	21.2	449	822	16
17	2.62	67	15.2	2.88	41	10.8	19.7	354	603	17
18	2.71	77	18.0	3.68	82	26.4	14.0	141	171	18
19	2.83	64	14.8	3.40	28 S	8.52	10.8	77	72.5	19
20	2.83	57	13.0	3.24	23	8.44	16.8	230	374	20
21	2.87	57	13.1	2.88	20	5.15	34.5	754	2 280	21
22	2.81	83	18.1	3.05	49	12.8	30.0	518 S	1 340	22
23	3.33	101	28.1	2.89	44	11.4	20.7	225	402	23
24	3.28	84	25.6	2.87	41	10.5	14.4	104	129	24
25	3.74	206	66.8	5.20	220	98.8	17.8	213	324	25
26	3.38	103 S	30.1	17.0	830 S	1 380	18.0	183	285	26
27	4.01	149	51.6	14.4	571	710	14.8	128	163	27
28	4.83	314	131	8.82	189	186	11.3	103	101	28
29	3.78	176	57.8	10.3	248	221	8.83 A	65	70.7	28
30	3.44	108	32.4	11.7	262	266	8.28 E	64	46.5	30
31	3.21	82	22.7				7.38 E	82	32.8	31
TOTAL	89.30		859.34	144.18		3 206.51	380.09		8 507.8	TOTAL

A - MANUAL GAUGE E - ESTIMATED S - SAMPLE(S) COLLECTED THIS DAY

BIG OTTER CREEK NEAR CALTON - STATION NO. 02GC025

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	PERCENT SILT	PERCENT CLAY
JAN 13	09:35	3.0	7.78	34.0	DH59	145															
JAN 19	09:40	0.1	11.7	34.0	DH59	158															
FEB 11	09:45	0.1	4.40	34.0	DH59	91															
MAR 04	12:30	0.1	21.6	34.0	DH59	767	378														
MAR 05	10:50	6.0	12.8	34.0	DH59	416															
MAR 12	15:30	1.0	15.8	34.0	DH59	337															
MAR 19	09:15	3.0	7.51	34.0	DH59	156															
MAR 25	14:10	10.0	7.80	34.0	DH59	123															
APR 02	09:30	2.0	22.4	34.0	DH59	502															
APR 08	09:15	8.0	67.0	34.0	DH59	1480	283														
APR 14	09:50	8.0	22.3	34.0	DH59	408															
APR 14	14:45	8.0	19.8	34.0	DH59	406															
APR 27	07:00	5.0	5.88	34.0	DH59	127															
MAY 02	20:00	10.0	3.84	34.0	DH59	80	201														
MAY 10	17:35	28.0	4.25	34.0	DH59	94															
MAY 23	13:15	25.0	3.81	34.0	DH59	80															
MAY 28	11:30	17.0	3.70	34.0	DH59	85															
MAY 30	16:45	31.0	3.27	34.0	DH59	69															
JUN 05	16:15	20.0	3.20	34.0	DH59	103															
JUN 17	19:20	27.0	2.85	34.0	DH59	132															
JUN 24	19:15	29.0	3.70	34.0	DH59	227	349														
JUL 04	08:30	24.0	3.38	34.0	DH59	150															
JUL 15	11:00	18.0	2.88	34.0	DH59	74															
JUL 17	08:55	19.0	2.17	34.0	DH59	70															
JUL 22	11:45	30.0	1.58	34.0	DH59	52															
JUL 31	17:50	28.0	1.34	34.0	DH59	17															
AUG 03	16:40	22.0	3.33	34.0	DH59	203	459														
AUG 25	13:15	22.0	2.05	34.0	DH59	43															
AUG 31	17:45	18.0	2.68	34.0	DH59	67															
SEP 09	15:15	16.0	2.28	34.0	DH59	35															
SEP 14	16:20	22.0	3.38	34.0	DH59	53															
SEP 22	14:00	20.0	2.83	34.0	DH59	62	341														
SEP 30	17:23	15.0	2.83	34.0	DH59	32															
OCT 05	16:45	14.0	2.57	34.0	DH59	27															
OCT 07	12:30	12.0	2.48	34.0	DH48	21															
OCT 14	16:50	15.0	2.58	34.0	DH59	48															
OCT 26	16:55	8.0	3.45	34.0	DH59	78															
NOV 02	15:05	14.0	3.11	34.0	DH59	80	308														
NOV 11	13:55	0.1	3.81	34.0	DH59	80															
NOV 19	08:40	4.0	3.56	34.0	DH59	28															
NOV 26	16:55	1.0	16.7	34.0	DH59	761	292														
DEC 02	13:45	2.0	8.08	34.0	DH59	130															
DEC 04	13:00	2.0	8.25	34.0	DH59	103															
DEC 14	09:30	0.1	7.58	34.0	DH59	91															
DEC 22	14:17	5.0	27.2	34.0	DH59	457	385														

NOTE : SINGLE VERTICAL LOCATED AT 34.0 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : JAN-DEC MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1975	PPPPPPPCCCCC	MANUAL	845	AUG 25	62	OCT 06	3 470	DEC 16	35 500	---	---	---
1976	CCCCCCCCCCCC	MANUAL	1 650	MAR 05	11	OCT 12 *	9 610	MAR 06	129 000	384	384	---
1977	CCCCCCCCCCCC	MANUAL	2 520	SEP 28	23	FEB 22	14 200	SEP 27	177 000	484	418	15.5
1978	CCCCCCCCCCCC	MANUAL	2 800	SEP 15	36	NOV 10	8 340	MAR 23	108 000	397	376	14.6
1979	CCCCCCCCCCCC	MANUAL	3 300	APR 14	54	SEP 27	34 100	APR 15 *	187 000	513	412	12.5
1980	CCCCCCCCCCCC	MANUAL	2 650	SEP 14	48	NOV 20	18 400	MAR 22	193 000	532	438	10.7
1981	CCCCCCCCCCCC	MANUAL	1 330	OCT 01	37	FEB 10	8 110	FEB 24	114 000	313	418	10.4
1982	CCCCCCCCCCCC	MANUAL	2 410	MAY 29	19	OCT 05	12 800	APR 01	258 000 *	707	457	12.1
1983	CCCCCCCCCCCC	MANUAL	6 130	AUG 12	22	MAY 17	30 600	AUG 12	237 000	648	481	11.1
1984	CCCCCCCCCCCC	MANUAL	5 170	SEP 28 *	28	OCT 11	17 700	MAY 23	198 000	545	488	9.8
1985	CCCCCCCCCCCC	MANUAL	4 630	MAR 28	38	JAN 9	11 500	MAR 09	182 000	497	488	8.7
1986	CCCCCCCCCCCC	MANUAL	2 850	MAR 19	26	FEB 12	23 800	MAR 20	194 000	450	485	8.0
1987	CCCCCCCCCCCC	MANUAL	1 480	APR 8	17	JUL 31	9 030	MAR 09	90 500	248	488	8.7

MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

BIGHEAD RIVER NEAR MEAFORD - STATION NO. 02FB010

LOCATION: LAT 44 34 10 N LONG 080 38 00 W
DRAINAGE AREA: 293 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MAR 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 17	09:45	0.1	3.90	10.0	DH48	8	350														
APR 07	09:05	2.0	15.8	10.0	DH59	24	262														
MAY 05	08:00	8.0	2.53	10.0	DH48	13	255														
MAY 25	13:45	10.0	1.81	10.0	DH48	5	316														
JUN 09	08:50	16.0	1.93	10.0	DH48	9	272														
JUL 28	09:00	22.0	0.887	10.0	DH48	13	284														
SEP 10	08:20	18.0	0.843	10.0	DH48	9	330														
OCT 13	09:15	10.0	1.40	10.0	DH48	17	229														
NOV 30	09:30	2.0	21.4	10.0	DH59	58	275														

NOTE : SINGLE VERTICAL LOCATED AT 10 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1987	--PPPPP-PPP-	MANUAL	58	NOV 30 *	5	MAY 25 *	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

BLACK RIVER NEAR MARATHON - STATION NO. 02BB002

LOCATION: LAT 48 41 20 N LONG 086 12 45 W
DRAINAGE AREA: 1 980 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JUN 18	09:00		12.2	21.0	D48	12	338														

NOTE : SINGLE VERTICAL LOCATED AT 21 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	---P--P--P--	MANUAL	647	APR 25 *	12	OCT 21 *	---	---	---	---	---	---
1986	---P---------	MANUAL	242	APR 25	210	APR 24	---	---	---	---	---	---
1987	-----P-------	MANUAL	12	JUN 18	12	JUN 18	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

CATFISH CREEK NEAR SPARTA - STATION NO. 02GC018

LOCATION: LAT 42 44 48 N LONG 081 03 20 W
DRAINAGE AREA: 287 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 18	15:00	1.0	1.59	7.0	DH48	9	327														
APR 23	11:45	15.0	1.35	7.0	DH48	17	425														
MAY 27	10:00	22.0	0.378	7.0	DH48	14	447														
JUL 02	14:00	18.0	0.238	7.0	DH48	43	367														
SEP 10	11:00	16.0	0.114	7.0	DH48	35	427														
OCT 07	10:15	12.0	0.141	7.0	DH48	43	378														
DEC 02	10:30	3.0	2.81	7.0	DH48	18	566														

NOTE : SINGLE VERTICAL LOCATED AT 7 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	---PPPPP-P--	MANUAL	156 AUG 28		18 MAY 7		---	---	---	---	---	---
1986	--P--PPPPPP-	MANUAL	506 MAR 11	*	13 NOV 6		---	---	---	---	---	---
1987	--PPP-P-PP-P	MANUAL	43 JUL 2		9 MAR 18	*	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

CONESTOGO RIVER ABOVE DRAYTON - STATION NO. 02GA039

LOCATION: LAT 43 46 58 N LONG 080 36 20 W
DRAINAGE AREA: 272 km²
TYPE OF FLOW: REGULATED SINCE 1982
TYPE OF GAUGE: MANUAL

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)		TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 13	09:45	5.0	2.80	3.0	X	DH48	13	383														
MAY 28	12:40	22.0	0.303	3.0	X	DH48	15	330														
SEP 15	14:25	20.0	0.018	3.0	X	DH48	5	298														
OCT 20	07:45	8.0	0.173	3.0	X	DH48	8	322														

NOTE : SINGLE VERTICAL LOCATED AT 15 METRES FOR 1987

VERTICAL SYMBOL(S): X - NOT AT REGULAR SINGLE SAMPLE VERTICAL

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	--PPP--P--P-	MANUAL	871 APR 5		8 MAY 14	*	---	---	---	---	---	---
1986	--PP---P----	MANUAL	785 MAR 18	*	9 APR 11		---	---	---	---	---	---
1987	---PP---PP--	MANUAL	15 MAY 28		5 SEP 15		---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

ONTARIO

CREDIT RIVER AT ERINDALE - STATION NO. 02HB002

SUSPENDED SEDIMENT FOR 1967

LOCATION: LAT 43 32 34 N LONG 79 38 26 W
DRAINAGE AREA: 785 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

TOTAL SUSPENDED SEDIMENT LOAD 24 800 TONNES FOR THE PERIOD JAN 01 TO DEC 31

REMARKS: OPEN WATER SAMPLING ONLY

	JAN			FEB			MAR			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	12.8	5	5.44	7.40 B	28	18.0	14.0 B	132	160	1
2	12.4	4	4.28	6.00 B	30	20.7	18.0 B	126 S	207	2
3	11.7	4	4.04	6.50 B	44	32.3	18.0 B	61 S	84.3	3
4	9.28	3	3.41	8.10 B	97 S	38.8	14.8 B	9 S	11.5	4
5	11.2	8 S	7.74	7.80 B	43 S	29.0	14.4 B	9	11.2	5
6	11.0	20 S	19.0	7.75 B	41 S	27.5	14.2 B	28 S	31.9	6
7	10.7	44 S	40.7	7.70 B	38	23.3	32.0 B	90	249	7
8	10.8	28	26.4	7.60 B	35	23.0	50.0 B	224	868	8
9	11.4	23 S	22.7	7.70 B	24	15.0	55.0 B	358 S	1 230	9
10	11.8	25	25.5	7.80 B	14	9.43	28.0 B	66	143	10
11	11.8	33	33.6	7.75 B	19 S	12.7	21.2 B	33 S	80.4	11
12	11.6	28 S	28.1	7.65 B	13	8.58	18.0 B	41	67.3	12
13	11.5	21	20.8	7.60 B	8 S	5.81	17.8 B	44 S	67.7	13
14	11.5	20 S	20.0	7.50 B	10	6.48	17.0 B	41	60.2	14
15	15.7	31	42.1	7.40 B	7	4.48	13.9	38	45.6	15
16	16.8	34 S	56.8	7.40 B	8	5.11	13.2	32 S	36.8	16
17	12.0	23	23.8	7.35 B	10	6.35	12.8	31	34.3	17
18	9.00 B	18	14.0	7.33 B	9	5.70	13.0	31 S	34.8	18
19	7.20 B	17 S	10.8	7.32 B	10	6.32	13.6	45	53.7	19
20	6.80 B	15	8.12	7.30 B	15	10.1	14.8	52 S	68.5	20
21	6.25 B	15 S	8.04	7.30 B	20	12.8	16.1	80	83.5	21
22	6.07 B	16	8.39	7.35 B	21	13.3	16.8	58	81.8	22
23	6.00 B	15 S	7.78	7.40 B	20 S	12.8	18.4	50 S	79.5	23
24	5.97 B	12	6.19	7.45 B	20	12.9	18.4	41	65.7	24
25	5.95 B	11	5.65	7.50 B	14 S	9.07	18.9	44 S	74.9	25
26	6.00 B	11 S	5.70	7.53 B	24	15.8	25.4	74	162	26
27	6.00 B	12	6.22	7.60 B	21 S	13.8	25.1	70	152	27
28	6.05 B	13	6.60	7.80 B	18	12.1	20.8	51	92.1	28
29	6.20 B	13 S	6.96				18.5	43	87.1	29
30	6.50 B	18	10.1				24.1	87 S	140	30
31	6.90 B	20	11.9				31.2	61	164	31
TOTAL	288.47		489.37	212.88		411.04	648.7		4 788.8	TOTAL

	APR			MAY			JUN			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	28.8	35 S	81.0	8.89	15 S	11.9	4.77	34 S	14.0	1
2	34.2	39	115	7.82	13	8.78	5.26	39	17.7	2
3	39.2	33 S	80.4	7.22	13	8.11	5.16	27 S	12.0	3
4	33.7	84	157	8.88	6 S	4.60	4.72	24	9.79	4
5	89.4	458	3 540	8.85	11	8.23	4.26	22 S	8.10	5
6	86.2	418 S	3 470	8.52	19 S	10.7	4.38	24	9.08	6
7	81.2	283	2 320	8.15	40	21.3	4.41	30	11.4	7
8	44.8	93 S	361	8.08	37 S	19.5	4.57	38 S	14.2	8
9	31.0	78	209	8.87	38	18.8	4.22	32	11.7	9
10	25.1	70 S	152	8.84	35	17.1	4.02	38 S	13.2	10
11	22.0	62	118	8.85	44 S	22.2	3.85	39	13.0	11
12	27.0	84	219	8.81	44	22.1	4.31	80 S	29.6	12
13	27.4	88 S	234	8.83	46 S	22.4	4.78	78	32.7	13
14	22.0	65	124	8.10	57	30.0	4.74	60	24.8	14
15	20.4	56 S	98.7	7.18	89 S	42.9	3.93	88 S	18.7	15
16	19.8	58	95.8	7.18	62	38.3	3.84	49	15.0	16
17	17.9	44	68.0	8.41	58	32.1	3.20	38 S	10.8	17
18	16.5	33	47.0	8.77	58	27.9	3.03	38	10.2	18
19	15.3	27	35.7	8.78	55	27.5	3.21	38 S	9.88	19
20	14.2	27 S	33.1	8.78	58 S	27.4	3.24	34	9.52	20
21	13.0	25	28.1	8.04	53	27.7	3.09	32	8.84	21
22	12.2	24 S	25.3	8.22	48 S	28.3	13.7	338 E	283	22
23	11.6	23	23.1	8.32	52	28.4	8.28	108	77.2	23
24	11.1	24 S	23.0	8.72	45	22.2	8.07	87 S	36.1	24
25	10.4	27	24.3	8.88	41 S	18.7	4.81	38	16.1	25
26	9.88	25	21.3	8.17	44	23.8	8.38	87 S	31.2	26
27	9.32	23 S	18.8	8.81	38 S	20.8	4.12	45	16.0	27
28	9.88	24	20.0	8.81	38	18.1	3.83	25	7.82	28
29	8.88	17 S	14.0	8.28	38 S	17.8	3.74	25 S	8.08	29
30	8.07	17	13.3	4.88	28	10.8	3.43	25	7.41	30
31				4.71	32	13.0				31
TOTAL	808.88		11 878.8	181.88		847.82	138.87		788.82	TOTAL

B - ICE CONDITIONS E - ESTIMATED S - SAMPLE(S) COLLECTED THIS DAY

CREDIT RIVER AT ERINDALE - STATION NO. 02HB002

SUSPENDED SEDIMENT FOR 1987

DAY	JUL DAILY DISCHARGE (m^3/s)	JUL MEAN CONCENTRATION (mg/L)	JUL DAILY LOAD (t)	AUG DAILY DISCHARGE (m^3/s)	AUG MEAN CONCENTRATION (mg/L)	AUG DAILY LOAD (t)	SEP DAILY DISCHARGE (m^3/s)	SEP MEAN CONCENTRATION (mg/L)	SEP DAILY LOAD (t)	DAY
1	3.37	25	7.28	2.67	17	3.82	2.79	35	8.86	1
2	3.28	26	7.89	6.25	91	49.5	2.79	34 S	8.20	2
3	4.80	85	37.0	5.36	46	21.3	2.25	28	5.47	3
4	4.47	82	33.8	4.31	33 S	13.3	2.10	28 S	5.08	4
5	4.15	45	16.1	3.88	36 S	11.4	2.24	28	5.42	5
6	4.18	45	16.3	3.27	35	7.05	2.01	26	4.86	6
7	6.53	74	41.8	3.34	27 S	7.78	2.00	26	4.49	7
8	7.92	88	38.7	3.87	33	10.2	2.93	36	9.82	8
9	7.33	80	37.4	6.70	102	59.0	2.81	37	8.98	9
10	6.82	57	33.6	6.77	62	30.4	2.48	29	6.21	10
11	5.36	45	20.8	5.61	40	18.7	3.17	55	15.9	11
12	4.36	33	12.4	4.34	29	10.9	3.71	70	22.4	12
13	4.18	44	15.8	3.67	27	8.33	4.28	90	33.1	13
14	7.51	108	70.7	3.28	33	8.48	4.67	134 S	52.9	14
15	5.40	86	30.8	3.12	17	4.86	3.14	84	22.8	15
16	4.78	52	21.5	2.82	14	3.41	2.83	58 S	13.7	16
17	4.00	47	16.2	3.78	46 S	14.9	4.18	146	52.9	17
18	3.23	38	10.9	3.64	47	14.6	5.98	513 S	309	18
19	3.48	57 E	20.1	3.17	39 S	10.7	4.80	128	54.2	19
20	30.5	283 E	748	2.63	36	8.63	4.87	87	41.7	20
21	9.32	74	59.6	2.45	39 S	8.28	7.88	216 S	143	21
22	6.82	55	31.0	2.85	42	8.82	6.72	185	147	22
23	5.01	45 S	19.5	2.23	15	2.89	5.74	120 S	59.5	23
24	6.08	93	48.9	2.10	14 S	2.84	4.32	83	34.7	24
25	5.81	82	39.0	2.22	14	2.89	3.80	89 S	31.5	25
26	3.82	30	10.2	2.32	22 S	6.41	3.34	55	15.4	26
27	3.32	23	8.80	2.46	43	9.21	3.09	46	12.3	27
28	2.81	20	5.03	2.37	43 S	8.81	3.15	49 S	13.3	28
29	2.78	20	4.82	2.80	51	12.8	3.88	61	18.9	29
30	2.80	17	4.11	2.71	45	10.5	3.59	34 S	10.5	30
31	2.89	19	4.74	3.20	59 S	16.3				31
TOTAL	176.80		1 448.77	108.26		402.33	113.85		1 181.71	TOTAL

DAY	OCT DAILY DISCHARGE (m^3/s)	OCT MEAN CONCENTRATION (mg/L)	OCT DAILY LOAD (t)	NOV DAILY DISCHARGE (m^3/s)	NOV MEAN CONCENTRATION (mg/L)	NOV DAILY LOAD (t)	DEC DAILY DISCHARGE (m^3/s)	DEC MEAN CONCENTRATION (mg/L)	DEC DAILY LOAD (t)	DAY
1	3.58	26	7.87	4.38	9	3.39	12.8	73	81.4	1
2	3.50	31 S	8.38	3.88	8 S	2.88	9.86	48 S	39.8	2
3	3.24	17	4.76	3.87	11	3.88	7.84	41	27.1	3
4	3.30	13	3.71	4.31	8 S	2.98	8.71	34 S	19.7	4
5	3.32	14 S	4.02	4.40	8	1.99	9.85	30	15.2	5
6	3.42	18	5.33	4.08	7 S	3.48	5.00 B	25	10.8	6
7	4.68	62 S	21.1	3.71	4	1.28	4.10 B	22 S	7.79	7
8	4.85	38	15.4	4.00	10	3.48	5.43	24	11.3	8
9	4.81	20 S	8.31	5.08	21 S	9.22	8.94	27	18.2	9
10	4.24	19	6.98	5.07	21	9.20	10.1	44	36.4	10
11	3.82	18	5.84	4.81	10 S	3.98	9.04	37	28.9	11
12	3.70	12	3.84	4.12	10 S	3.58	8.17	27	19.1	12
13	3.82	8	2.81	4.18	9	3.25	7.53	22	14.3	13
14	3.68	17 S	5.71	3.85	4	1.33	6.75	24 S	14.0	14
15	3.73	18 S	5.14	3.80	5	1.87	6.75 B	30	39.2	15
16	3.61	22 S	6.88	3.42	12 S	3.85	7.80 B	33 S	31.4	16
17	3.68	42	14.1	3.72	28	9.00	6.40 B	31 S	17.1	17
18	3.96	42	14.3	6.86	114 S	55.7	5.85 B	27	13.8	18
19	3.73	38 S	12.5	4.77	39	16.1	5.82	27	13.4	19
20	3.87	40	12.3	4.36	17 S	6.40	10.5	202	323	20
21	3.86	33 S	10.2	3.80 B	13	4.27	19.5	131 S	221	21
22	3.80	36	12.1	3.45 B	9	2.88	12.3	44	46.8	22
23	5.28	37 S	18.8	3.75 B	37 S	12.0	9.93	23 S	19.7	23
24	6.83	86	38.2	4.08	17 S	6.01	8.37	21	15.2	24
25	7.14	57	35.2	15.5	219	291	14.0	87	81.0	25
26	6.29	36 S	20.7	14.8	197 S	252	12.0 B	61	63.2	26
27	6.73	62	38.1	8.78	86 S	48.4	7.50 B	37	24.0	27
28	7.41	54 S	34.6	6.90	44	26.2	5.80 B	21	10.2	28
29	6.85	28	19.8	16.2	232	311	4.80 B	12	5.06	29
30	5.36	12 S	5.58	17.2	161 S	241	4.70 B	8	3.85	30
31	4.78	10	4.11				4.80 B	10	3.97	31
TOTAL	139.34		388.90	178.81		1 340.58	380.74		1 267.39	TOTAL

B - ICE CONDITIONS E - ESTIMATED S - SAMPLE(S) COLLECTED THIS DAY

ONTARIO

CREDIT RIVER AT ERINDALE - STATION NO. 02HB002

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)		SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JAN 05	08:30	0.1	8.88		MID	DH48	4															
JAN 06	13:00	0.1	8.90		MID	DH48	10															
JAN 07	08:30	0.1	10.1		MID	DH48	44															
JAN 09	08:15	0.1	11.8		MID	DH48	23															
JAN 12	08:30	0.1	11.1		MID	DH48	30															
JAN 14	08:30	0.1	11.2		MID	DH48	20															
JAN 16	08:30	0.1	10.8		MID	DH48	38	604														
JAN 19	08:30	0.1	7.20	W	MID	SURF	17															
JAN 21	08:30	0.1	6.35	W	MID	DH48	17															
JAN 23	08:30	0.1	6.00	W	MID	SURF	18	378														
JAN 26	12:50	0.1	6.00	W	MID	SURF	11															
JAN 28	08:30	0.1	6.20	W	MID	SURF	13															
FEB 04	08:30	0.1	6.10	W	MID	SURF	82															
FEB 05	10:20	0.1	7.80		MID	DH48	43															
FEB 06	08:30	0.1	7.75	W	MID	SURF	42															
FEB 11	08:30	0.1	7.75	W	MID	SURF	20															
FEB 13	08:30	0.1	7.60	W	MID	SURF	9															
FEB 23	08:20	0.1	7.40	W	MID	DH48	16															
FEB 25	08:30	0.1	7.50	W	MID	DH48	12															
FEB 27	08:30	0.1	7.60	W	MID	SURF	22	326														
MAR 02	08:30	0.1	18.0	W	MID	DH48	133															
MAR 03	12:15	0.1	16.0	W	MID	DH48	62															
MAR 04	08:30	0.1	14.8	W	MID	SURF	4															
MAR 05	08:30	0.1	14.2	W	MID	DH48	10															
MAR 09	08:30	0.1	55.0	W	MID	DH48	289	338														
MAR 11	08:30	0.1	21.2	W	MID	SURF	28															
MAR 13	08:30	0.1	17.8	W	MID	DH48	41															
MAR 16	08:30	0.1	12.6		MID	DH48	30															
MAR 18	08:30	1.0	13.2		MID	DH48	25															
MAR 18	09:50	0.5	13.0		MID	DH48	30															
MAR 20	08:30	2.0	15.0		MID	DH48	52															
MAR 23	08:30	5.0	16.7		MID	DH48	52															
MAR 25	08:30	6.0	19.5		MID	DH48	43	335														
MAR 30	08:30	5.0	19.0		MID	DH48	42															
APR 01	08:20	0.1	25.0		MID	DH48	28															
APR 03	08:30	1.0	24.9		MID	DH48	28															
APR 06	08:30	4.0	51.3		MID	DH48	411	334														
APR 08	07:30	7.0	47.6		MID	DH48	93															
APR 08	12:50	7.0	43.2		MID	DH48	88															
APR 10	07:30		25.6		MID	DH48	71															
APR 13	07:30	7.0	26.6		MID	DH48	105	358														
APR 15	07:30	8.0	20.8		MID	DH48	64															
APR 20	07:30	10.0	14.2		MID	DH48	29															
APR 22	07:30	14.0	13.1		MID	DH48	24															
APR 24	07:30	13.0	11.2		MID	DH48	24															
APR 27	07:30	10.5	9.17		MID	DH48	22															
APR 28	07:30	10.0	8.47		MID	DH48	18															
MAY 01	07:30	7.5	8.48		MID	DH48	17															
MAY 04	07:30	7.0	8.98		MID	DH48	13	371														
MAY 06	07:30	11.0	8.41		MID	DH48	12															
MAY 06	09:10	11.0	8.84		MID	DH48	12															
MAY 08	07:30	10.5	8.19		MID	DH48	38															
MAY 11	07:30	10.5	8.18		MID	DH48	43															
MAY 13	07:30	13.0	8.83		MID	DH48	47															
MAY 15	07:30	15.0	8.76		MID	DH48	56	400														
MAY 20	07:30	13.0	8.70		MID	DH48	52															
MAY 22	07:30	16.0	8.06		MID	DH48	42															
MAY 26	07:30	13.0	8.62		MID	DH48	43															
MAY 27	07:30	14.0	8.73		MID	DH48	35															
MAY 29	07:30	17.0	8.35		MID	DH48	41															
JUN 01	07:30	21.0	4.58		MID	DH48	30	323														
JUN 03	07:30	21.5	5.08		MID	DH48	28															
JUN 05	07:30	17.0	4.11		MID	DH48	23															
JUN 08	07:30	18.0	4.60		MID	DH48	37															
JUN 10	07:30	13.0	4.38		MID	DH48	47															
JUN 10	08:15	13.0	4.37		MID	DH48	37															
JUN 12	07:15	17.0	4.07		MID	DH48	61															
JUN 15	07:40	21.5	4.07		MID	DH48	61															
JUN 17	07:30	19.0	3.35		MID	DH48	43															
JUN 19	08:00	20.0	3.28		MID	DH48	38															
JUN 24	07:30	20.5	5.51		MID	DH48	73	433														
JUN 26	07:30	22.0	5.97		MID	DH48	57															
JUN 29	07:30	18.5	3.77		MID	DH48	24															
JUL 23	08:00	24.0	4.84		MID	DH48	45															
AUG 04	07:30	22.0	4.68		MID	DH48	28	395														
AUG 05	07:25	15.0	3.81		MID	DH48	36															
AUG 07	07:30	19.0	3.10		MID	DH48	30															
AUG 17	07:30	24.0	3.88		MID	DH48	25															
AUG 19	07:30	21.0	3.47		MID	DH48	40															
AUG 21	07:30	18.0	2.68		MID	DH48	39															
AUG 24	07:30	15.0	2.28		MID	DH48	16															
AUG 26	07:30	16.0	2.10		MID	DH48	20															
AUG 28	07:20	15.5	2.41		MID	DH48	42															
AUG 31	07:30	17.0	3.22		MID	DH48	48	402														
SEP 02	07:30	15.0	2.85		MID	DH48	38															
SEP 04	07:30	13.0	2.33		MID	DH48	29															
SEP 14	07:30	15.5	4.00		MID	DH48	128	467														
SEP 14	11:40	15.0	4.00		MID	DH48	130															
SEP 16	07:30	15.0	3.02		MID	DH48	84															
SEP 18	07:30	14.0	11.5		MID	DH48	1020	337														
SEP 21	07:50	15.0	7.88		MID	DH48	223															
SEP 23	07:30	14.0	5.01		MID	DH48	127															
SEP 25	07:30	12.0	3.88		MID	DH48	73															
SEP 28	07:30	14.0	3.10		MID	DH48	48															
SEP 30	07:30	15.0	3.80		MID	DH48	35															
OCT 02	07:30	12.0	3.47		MID	DH48	21	377														
OCT 05	07:30	8.0	3.18		MID	DH48	14															
OCT 07	07:30	11.0	3.39		MID	DH48	13															
OCT 09	07:30	7.5	4.78		MID	DH48	30															
OCT 14	07:30	8.5	3.47		MID	DH48	11															
OCT 15	09:10	8.0	3.68		MID	DH48	11															
OCT 16	07:30	7.5	3.88		MID	DH48	21															

NOTE : SINGLE VERTICAL LOCATED AT MID (MID STREAM) FOR 1987

DISCHARGE SYMBOL(S). W - DAILY MEAN, ICE CONDITIONS

CONTINUED

CREDIT RIVER AT ERINDALE - STATION NO. 02HB002 (CONTINUED)

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)		SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
OCT 19	07:30	7.0	3.80		MID	DH48	35															
OCT 21	07:30	7.0	3.47		MID	DH48	22															
OCT 23	07:30	6.5	5.27		MID	DH48	35															
OCT 26	08:30	3.0	8.37		MID	DH48	40															
OCT 28	08:30	4.0	7.75		MID	DH48	59	399														
OCT 30	08:15	4.0	8.47		MID	DH48	17															
NOV 02	08:30	8.0	3.84		MID	DH48	12															
NOV 04	08:30	10.0	4.26		MID	DH48	12															
NOV 06	08:30	3.5	3.80		MID	DH48	8															
NOV 09	08:30	5.0	5.04		MID	DH48	16															
NOV 11	08:30	0.1	4.47		MID	DH48	13															
NOV 13	13:20	3.0	3.80		MID	DH48	9															
NOV 16	08:30	3.0	3.39		MID	DH48	8															
NOV 18	08:30	7.0	8.08		MID	DH48	127	373														
NOV 20	08:40	3.5	4.33		MID	DH48	17															
NOV 23	08:30	0.1	3.75	W	MID	DH48	35															
NOV 24	08:50	0.5	4.00		MID	DH48	17															
NOV 28	08:30	1.0	15.5		MID	DH48	226															
NOV 27	08:30	1.5	8.83		MID	DH48	70															
NOV 30	08:30	4.0	17.1		MID	DH48	176	400														
DEC 02	08:30	1.0	8.78		MID	DH48	61															
DEC 04	08:30	1.0	8.85		MID	DH48	38															
DEC 07	08:20	1.0	3.77		MID	DH48	22	378														
DEC 14	08:30	2.0	8.87		MID	DH48	24															
DEC 16	08:30	0.1	7.80	W	MID	DH48	30															
DEC 17	08:30	0.1	8.40	W	MID	DH48	33															
DEC 21	08:20	0.1	20.8		MID	DH48	141	344														
DEC 23	09:30	1.0	10.1		MID	DH48	24															

NOTE : SINGLE VERTICAL LOCATED AT MID (MID STREAM) FOR 1987

DISCHARGE SYMBOL(S): W - DAILY MEAN; ICE CONDITIONS

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : JAN-DEC MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1973	--------CCCCC	DUAL	380	NOV 15	1	OCT 08	383	OCT 30	3 400	---	---	---
1974	CCCCCCCCCCCC	DUAL	3 030	MAY 17 *	1	SEP 05	88 200	MAY 17 *	133 000 *	363	383	---
1975	CCCCCCCCCCCC	MANUAL	1 830	APR 15	1	JAN 05	30 200	APR 15	76 100	192	278	30.8
1976	CCCCCCCCCCCC	MANUAL	1 030	MAR 20	3	JUL 15	14 100	MAR 20	53 800	148	234	28.2
1977	CCCCCCCCCCCC	MANUAL	883	MAR 13	4	MAY 15	12 700	MAR 13	45 600	125	207	26.1
1978	CCCCCCCCCCCC	MANUAL	918	APR 01	2	OCT 02	5 540	APR 01	28 700	76.7	181	27.1
1979	CCCCCCCCCCCC	MANUAL	717	DEC 24	1	SEP 22	8 480	DEC 25	46 800	127	172	23.9
1980	CCCCCCCCCCCC	MANUAL	1 270	MAR 21	3	OCT 15	6 880	MAR 21	30 800	84.5	159	23.2
1981	CCCCCCCCCCCC	MANUAL	824	SEP 04	1	SEP 15	6 370	FEB 19	38 700	108	183	21.3
1982	CCCCCCCCCCCC	MANUAL	1 770	MAR 31	1	JAN 11	15 800	MAR 31	60 400	138	151	19.1
1983	CCCCCCCCCCCC	MANUAL	328	DEC 12	1	APR 22	1 870	FEB 03	22 100	80.4	142	19.2
1984	CCCCCCCCCCCC	MANUAL	745	APR 5	0	JAN 15 *	---	---	---	---	---	---
1985	CCCCCCCCCCCC	MANUAL	1 890	FEB 26	3	MAY 17	---	---	---	---	---	---
1986	CCCCCCCCCCCC	MANUAL	1 340	AUG 27	1	JAN 5	10 400	SEP 11	80 800	---	---	---
1987	CCCCCCCCCCCC	MANUAL	1 020	SEP 18	4	JAN 5	3 540	APR 05	24 800	88.0	135	19.0

DUAL - MANUAL AND AUTOMATIC SAMPLING MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH * - EXTREME FOR PERIOD OF RECORD

ONTARIO

DON RIVER AT TODMORDEN - STATION NO. 02HC024

SUSPENDED SEDIMENT FOR 1987

LOCATION: LAT 43 41 50 N LONG 79 21 15 W
DRAINAGE AREA: 316 km²
TYPE OF FLOW: REGULATED SINCE 1973
TYPE OF GAUGE: RECORDING

TOTAL SUSPENDED SEDIMENT LOAD 27 800 TONNES FOR THE PERIOD JAN 01 TO DEC 31

REMARKS:

	JAN			FEB			MAR			
DAY	DAILY DISCHARGE (m^3/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m^3/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m^3/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	3.52	49	14.9	2.24	26	5.03	24.4	429 E	904	1
2	3.22	50	13.9	2.67	27	8.23	22.8	361 E	709	2
3	2.87	46	11.6	4.83	76	31.7	8.72	79	59.5	3
4	2.84	45	9.88	3.43	49	14.5	5.85	50	25.3	4
5	2.44	40	8.43	2.33	36	7.06	3.36	47	13.7	5
6	2.42	38	7.95	2.22	34	6.52	5.06	107	47.0	6
7	2.47	36	7.88	2.85	39	8.93	11.0	211 E	201	7
8	2.38	35	8.98	4.36	83	31.4	12.6	168	183	8
9	2.32	35	8.71	2.31	57	11.4	12.7	126	140	9
10	2.79	73	17.8	2.64	57	13.0	4.86	42	17.6	10
11	3.06	73	19.2	2.42	46	9.62	3.28	38 S	10.2	11
12	2.65	71	17.5	2.36	40	8.23	3.02	25 S	8.52	12
13	2.92	82	20.7	1.65	37	5.81	2.74	21	4.97	13
14	3.01	73	19.0	1.79	37	5.72	2.87	17	3.82	14
15	5.99	140	72.5	1.82	34	4.47	2.45	14	2.96	15
16	3.56	67	20.6	1.65	31	4.42	2.41	12	2.50	16
17	2.56	56	12.4	1.78	29	4.48	3.37	9	1.84	17
18	2.51	43	9.33	1.82	27	4.48	2.32	8 S	1.60	18
19	2.36	31	6.29	1.87	28	4.77	2.38	9	1.84	19
20	2.33	30	6.04	2.08	28	4.98	2.44	8	1.89	20
21	2.58	34	7.61	2.21	25	4.77	2.48	11	2.37	21
22	2.40	32	6.64	2.40	33	8.64	2.53	10	2.19	22
23	2.26	27	5.27	2.54	42	9.22	2.62	9 S	2.04	23
24	1.83	18	2.68	2.40	43	8.82	2.65	18	4.35	24
25	1.85	18	2.86	2.18	35	6.59	3.43	172 S	51.0	25
26	1.88	18	3.09	2.13	30	5.52	4.67	295 S	118	26
27	1.82	18	2.99	2.15	28	4.64	3.15	70	19.2	27
28	1.86	23	3.68	2.44	24	5.06	2.64	49	12.0	28
29	2.01	21	3.65				2.60	43	9.66	29
30	2.50	26	5.62				7.35	321 S	204	30
31	2.84	30	8.95				7.01	420 S	254	31
TOTAL	81.80		380.32	67.49		244.38	178.82		3 013.95	TOTAL

	APR			MAY			JUN			
DAY	DAILY DISCHARGE (m^3/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m^3/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m^3/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	7.68	447 S	297	2.06	39 S	7.01	4.78	414 S	171	1
2	11.0	383 S	364	2.06	34 S	6.06	2.24	486 S	131	2
3	6.91	243	145	1.89	28 S	4.57	2.05	95 S	17.0	3
4	14.7	408 S	518	1.83	27 S	4.27	1.76	60 S	9.23	4
5	17.0	434 S	637	1.67	30 S	4.86	1.88	84 S	7.84	5
6	14.5	452 S	566	1.74	38 S	5.41	1.78	52 S	7.68	6
7	11.5	407 S	404	1.78	35 S	5.36	3.05	93 S	24.5	7
8	5.87	180	86.4	1.73	35 S	5.23	4.42	187 S	83.6	8
9	4.72	83	33.4	1.62	32 S	5.03	2.07	47 S	8.41	9
10	3.87	46	15.2	1.73	30 S	4.48	1.88	23 S	3.36	10
11	3.26	35	9.85	2.76	44 S	10.5	1.81	25 S	3.62	11
12	8.11	415 S	327	1.88	26 S	4.22	3.13	126 S	34.1	12
13	8.22	411 S	221	1.87	30 S	4.33	6.91	400 S	228	13
14	4.03	49	17.1	3.00	85 S	16.3	2.86	82	18.2	14
15	3.97	31 S	10.5	4.04	50 S	17.5	1.81	38	5.82	15
16	3.53	31 S	9.45	1.94	23	3.86	1.87	24	3.28	16
17	3.84	26 S	7.11	1.75	23	3.48	1.85	22 S	2.85	17
18	2.78	27 S	6.49	1.85	24	3.42	1.48	24 S	3.08	18
19	2.57	27 S	6.00	1.73	25	3.72	1.48	18 S	2.27	19
20	2.85	26 S	6.73	1.71	33	3.40	1.44	27 S	3.38	20
21	2.85	26 S	6.73	1.70	22	3.23	1.37	13 S	1.42	21
22	3.44	11 S	2.32	1.87	34 S	5.79	19.4	1 210 S	2 030	22
23	2.70	41 S	9.56	1.78	45 S	6.60	3.91	307 S	104	23
24	2.48	43 S	9.14	1.71	43 S	6.35	2.68	58 S	13.6	24
25	3.25	38 S	7.39	1.88	52 S	7.55	2.08	44 S	7.91	25
26	2.11	26 S	6.38	4.31	132 S	49.2	8.97	186 S	100.0	26
27	3.78	102 S	33.5	16.6	1 080 S	1 740	2.33	43 S	8.68	27
28	3.85	135 S	44.9	4.33	1 070 S	400	2.13	38 S	6.99	28
29	2.54	57 S	12.5	2.17	118 S	22.3	1.88	29 S	4.23	29
30	2.22	41 S	7.86	4.37	202 S	76.3	1.85	28 S	4.02	30
31				2.39	111 S	22.8				31
TOTAL	186.50		3 833.62	85.53		2 481.43	93.88		3 038.21	TOTAL

E - ESTIMATED S - SAMPLE(S) COLLECTED THIS DAY

DON RIVER AT TODMORDEN - STATION NO. 02HC024

SUSPENDED SEDIMENT FOR 1987

DAY	JUL DAILY DISCHARGE (m^3/s)	JUL MEAN CONCENTRATION (mg/L)	JUL DAILY LOAD (t)	AUG DAILY DISCHARGE (m^3/s)	AUG MEAN CONCENTRATION (mg/L)	AUG DAILY LOAD (t)	SEP DAILY DISCHARGE (m^3/s)	SEP MEAN CONCENTRATION (mg/L)	SEP DAILY LOAD (t)	DAY
1	1.53	25 S	3.30	1.46	79 S	9.97	2.59	116 S	26.0	1
2	1.52	27 S	3.55	7.09	454 S	279	1.77	32 S	4.89	2
3	2.89	177 S	44.2	3.70	153 S	48.9	1.54	29 S	3.86	3
4	3.67	393 S	125	3.01	133 S	34.6	1.37	21 S	2.49	4
5	1.66	96 S	13.6	1.87	130 S	21.0	1.32	23 S	2.82	5
6	2.32	498 S	143	1.81	76 S	9.92	1.33	20 S	2.30	6
7	6.89	1 110 S	853	1.65	63 S	8.98	1.32	28 S	2.97	7
8	14.2	1 030 S	1 260	1.49	29 S	3.73	3.33	82 S	23.5	8
9	9.22	392 S	312	13.0	802 S	901	2.13	49 S	9.02	9
10	4.80	315 S	125	3.89	588 S	198	1.46	28 S	3.46	10
11	2.87	197 S	27.5	2.81	72 S	16.2	2.84	202 S	48.8	11
12	2.01	81 S	8.65	1.84	36 S	5.72	2.30	84 S	12.7	12
13	8.93	588 S	340	1.55	25 S	3.37	7.52	624 S	406	13
14	15.2	1 640 S	2 150	1.54	25 S	3.33	3.38	113 S	33.0	14
15	3.81	312 S	103	1.48	17 S	2.17	1.84	44 S	6.98	15
16	2.67	144 S	35.7	2.25	87 S	13.0	1.49	30 S	3.86	16
17	2.48	113 S	24.3	4.58	333 S	132	3.83	180 S	59.2	17
18	1.93	101 S	16.8	2.15	283 S	48.1	5.84	188 S	84.8	18
19	1.77	184 S	28.1	1.49	42 S	5.41	5.14	200 S	88.8	19
20	13.0	890 S	1 000	1.40	16 S	1.81	8.58	95 S	54.0	20
21	2.78	177	42.5	1.35	17 S	1.98	13.7	524 S	620	21
22	2.21	133	25.4	1.36	19 S	2.23	5.47	188 S	88.9	22
23	1.76	114	17.2	1.28	20 S	2.16	3.84	65 S	17.3	23
24	2.62	231	52.3	1.15	17 S	1.69	1.78	32 S	4.92	24
25	2.54	148	31.8	1.31	19 S	2.15	1.63	13 S	1.63	25
26	1.80	81	8.43	1.33	18 S	1.86	1.58	19	2.59	26
27	1.47	48	6.32	1.34	13 S	1.51	3.13	188 S	48.4	27
28	1.43	53	6.85	1.40	17 S	2.06	8.64	351 S	198	28
29	1.48	47	5.89	2.63	32 S	8.89	2.98	122 S	31.4	29
30	3.85	224 S	78.4	1.47	14 S	1.78	2.50	78 S	16.4	30
31	1.53	85 S	12.0	7.28	769 S	477				31
TOTAL	127.80		6 901.80	81.35		2 248.60	101.84		1 895.82	TOTAL

DAY	OCT DAILY DISCHARGE (m^3/s)	OCT MEAN CONCENTRATION (mg/L)	OCT DAILY LOAD (t)	NOV DAILY DISCHARGE (m^3/s)	NOV MEAN CONCENTRATION (mg/L)	NOV DAILY LOAD (t)	DEC DAILY DISCHARGE (m^3/s)	DEC MEAN CONCENTRATION (mg/L)	DEC DAILY LOAD (t)	DAY
1	1.84	27	4.29	1.67	17	2.31	8.40	27	14.9	1
2	1.81	40	6.60	1.51	18	2.48	2.38	33	6.67	2
3	1.55	17	2.26	3.67	73 S	23.1	2.65	38	6.93	3
4	1.47	13	1.85	2.31	20 S	3.89	2.66	42	9.65	4
5	1.62	13	1.71	1.88	33 S	4.79	2.13	34	6.26	5
6	1.58	21	2.63	1.54	36 S	4.79	1.63	24	3.79	6
7	7.18	300	186	1.53	29 S	3.83	1.70	25	3.87	7
8	4.35	139	52.2	3.85	102 S	34.0	1.65	35	5.02	8
9	2.86	44	9.73	5.78	97 S	48.4	5.21	102	46.9	9
10	1.60	18	2.33	2.19	36 S	7.19	3.85	44	13.9	10
11	1.48	12	1.53	1.82	36 S	5.98	2.68	32	7.41	11
12	1.48	11	1.41	1.74	38 S	5.41	3.30	57 S	19.1	12
13	1.50	12	1.68	1.80	39 S	5.39	2.39	63 S	13.0	13
14	1.49	8	0.73	1.84	45 S	6.12	2.03	84 S	9.47	14
15	1.46	14 S	1.76	1.80	30 S	3.85	9.74	110 S	93.6	15
16	1.47	21	2.87	1.48	29 S	3.85	8.19	80 S	42.0	16
17	2.24	131	35.7	2.77	101 S	24.2	3.80	34 S	11.5	17
18	2.71	118	27.2	4.20	93 S	33.7	2.88	20 S	4.98	18
19	1.87	52	7.50	2.07	44 S	7.87	2.41	49 S	10.3	19
20	1.58	37	4.99	1.97	33 S	5.32	18.8	156 S	257	20
21	1.50	34	4.41	1.53	31 S	4.10	8.62	66 S	49.2	21
22	1.54	62	8.88	1.47	44 S	6.89	6.36	48 S	26.3	22
23	8.32	236	128	1.50	36 S	4.84	4.87	43 S	18.1	23
24	5.08	211	92.5	1.53	26 S	3.44	3.44	49	14.8	24
25	4.61	166	66.8	20.1	480 S	834	7.44	102 S	65.6	25
26	2.29	38	7.52	12.8	353 S	383	4.48	41 S	15.8	26
27	4.86	211	66.0	6.42	97	53.8	3.40	48 S	13.8	27
28	3.02	84	21.9	3.35	44	12.7	3.00	50 S	13.0	28
29	3.06	34	8.11	30.3	335	868	2.09	30	5.43	29
30	1.74	33	4.86	8.90	76	58.4	1.78	44 S	8.80	30
31	1.67	20	2.89				2.25	84	10.5	31
TOTAL	78.38		787.71	124.31		2 194.28	138.41		838.37	TOTAL

S - SAMPLE(S) COLLECTED THIS DAY

ONTARIO

DON RIVER AT TODMORDEN - STATION NO. 02HC024

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 11	11:00	1.0	2.70	10.0	DH48	27	798														
MAR 12	11:35	1.0	2.83	10.0	DH48	23	771														
MAR 16	15:25	3.0	2.24	10.0	DH48	8	752														
MAR 23	11:00	4.0	2.58	10.0	DH48	10	727														
MAR 25	11:00		2.35	10.0	PS82	311															
MAR 28	11:00		4.88	10.0	PS82	474															
MAR 30	11:00		7.35	10.0	PS82	434															
MAR 31	11:00		5.77	10.0	PS82	388															
APR 01	11:00		4.70	10.0	PS82	482															
APR 02	11:00		13.4	10.0	PS82	420															
APR 04	11:00		7.71	10.0	PS82	348															
APR 05	11:00		17.5	10.0	PS82	413															
APR 06	11:00		11.7	10.0	PS82	393															
APR 07	11:00		10.7	10.0	PS82	418															
APR 12	11:00		2.85	10.0	PS82	381															
APR 13	11:00		5.43	10.0	PS82	453															
APR 15	10:00	10.0	3.72	10.0	DH48	20	755														
APR 15	22:00		3.32	10.0	PS82	35															
APR 16	10:00		4.12	10.0	PS82	29															
APR 16	22:00		3.04	10.0	PS82	30															
APR 17	10:00		2.83	10.0	PS82	29															
APR 17	22:00		2.78	10.0	PS82	30															
APR 18	10:00		2.83	10.0	PS82	28															
APR 18	22:00		2.58	10.0	PS82	30															
APR 19	10:00		2.21	10.0	PS82	28															
APR 19	22:00		2.42	10.0	PS82	28															
APR 20	10:00		2.40	10.0	PS82	28															
APR 20	22:00		2.44	10.0	PS82	27															
APR 21	10:00		2.40	10.0	PS82	30															
APR 21	22:00		2.44	10.0	PS82	27															
APR 22	13:00	15.0	2.38	10.0	DH48	9	730														
APR 23	13:00		2.35	10.0	PS82	41															
APR 24	13:00		2.30	10.0	PS82	36															
APR 25	13:00		2.14	10.0	PS82	40															
APR 26	13:00		3.03	10.0	PS82	36															
APR 27	13:00		3.10	10.0	PS82	33															
APR 28	13:00		3.08	10.0	PS82	127															
APR 29	13:00		2.35	10.0	PS82	45															
APR 30	13:00		2.17	10.0	PS82	41															
MAY 01	13:00		1.88	10.0	PS82	40															
MAY 02	13:00		1.98	10.0	PS82	33															
MAY 03	13:00		1.85	10.0	PS82	25															
MAY 04	13:00		1.74	10.0	PS82	27															
MAY 05	13:00		1.85	10.0	PS82	27															
MAY 06	13:00		1.81	10.0	PS82	35															
MAY 07	13:00		1.73	10.0	PS82	36															
MAY 08	13:00		1.68	10.0	PS82	38															
MAY 09	13:00		1.78	10.0	PS82	31															
MAY 10	13:00		1.67	10.0	PS82	30															
MAY 11	13:00		2.58	10.0	PS82	40															
MAY 12	13:00		1.82	10.0	PS82	27															
MAY 13	13:00		1.84	10.0	PS82	30															
MAY 14	13:00		1.84	10.0	PS82	32															
MAY 15	13:00		2.83	10.0	PS82	36															
MAY 22	13:30	17.0	1.89	10.0	DH48	15	723														
MAY 23	13:30		1.78	10.0	PS82	47															
MAY 24	13:30		1.84	10.0	PS82	45															
MAY 25	13:30		1.84	10.0	PS82	57															
MAY 26	13:30		6.08	10.0	PS82	269	682														
MAY 27	13:30		2.33	10.0	PS82	34															
MAY 28	13:30		3.22	10.0	PS82	784															
MAY 29	13:30		2.03	10.0	PS82	79															
MAY 30	13:30		1.80	10.0	PS82	377															
MAY 31	13:30		1.88	10.0	PS82	78															
JUN 01	13:30		2.74	10.0	PS82	774															
JUN 02	13:30		2.81	10.0	PS82	488															
JUN 03	13:30		1.88	10.0	PS82	71															
JUN 04	13:30		1.74	10.0	PS82	80															
JUN 05	13:30		1.84	10.0	PS82	53															
JUN 06	13:30		1.89	10.0	PS82	49															
JUN 07	13:30		2.19	10.0	PS82	35															
JUN 08	13:30		5.87	10.0	PS82	235															
JUN 09	13:30		1.85	10.0	PS82	42															
JUN 10	13:30		1.82	10.0	PS82	22															
JUN 11	13:30		1.80	10.0	PS82	24															
JUN 12	13:30		2.19	10.0	PS82	27															
JUN 13	13:30		3.78	10.0	PS82	384															
JUN 17	14:00	18.0	1.48	10.0	DH48	21	630														
JUN 17	14:01		1.48	10.0	PS82	31															
JUN 18	14:00		1.43	10.0	PS82	27															
JUN 19	14:00		1.48	10.0	PS82	24															
JUN 20	14:00		1.41	10.0	PS82	24															
JUN 21	14:00		1.35	10.0	PS82	34															
JUN 22	12:00		82.7	10.0	PS82	2180															
JUN 23	12:00		3.53	10.0	PS82	248															
JUN 24	12:00		2.85	10.0	PS82	52															
JUN 25	12:00		1.89	10.0	PS82	42															
JUN 26	12:00		8.32	10.0	PS82	182															
JUN 27	12:00		2.03	10.0	PS82	36															
JUN 28	12:00		2.08	10.0	PS82	31															
JUN 29	12:00		1.87	10.0	PS82	28															
JUN 30	12:00		1.87	10.0	PS82	28															
JUL 01	12:00		1.48	10.0	PS82	27															
JUL 02	12:00		1.43	10.0	PS82	24															
JUL 03	12:00		1.58	10.0	PS82	31															
JUL 04	12:00		2.81	10.0	PS82	401															
JUL 05	12:00		1.64	10.0	PS82	80															
JUL 06	12:00		1.51	10.0	PS82	177															
JUL 07	12:00		2.03	10.0	PS82	824															
JUL 08	13:20	25.0	7.88	10.0	DH48	855	381														
JUL 08	21:00		11.5	10.0	PS82	717															

NOTE : SINGLE VERTICAL LOCATED AT 10 METRES FOR 1987

CONTINUED

DON RIVER AT TODMORDEN - STATION NO. 02HC024 (CONTINUED)

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)		DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JUL 09	03:00		8.17	10.0	PS82	503																
JUL 09	09:00		7.78	10.0	PS82	348																
JUL 09	15:00		7.60	10.0	PS82	247																
JUL 09	21:00		8.13	10.0	PS82	288																
JUL 10	03:00		5.46	10.0	PS82	537																
JUL 10	09:00		3.70	10.0	PS82	372																
JUL 10	15:00		3.11	10.0	PS82	188																
JUL 10	21:00		4.54	10.0	PS82	124																
JUL 11	03:00		3.58	10.0	PS82	148																
JUL 11	09:00		2.88	10.0	PS82	98																
JUL 11	15:00		2.58	10.0	PS82	100																
JUL 11	21:00		2.53	10.0	PS82	73																
JUL 12	03:00		2.14	10.0	PS82	56																
JUL 12	09:00		1.98	10.0	PS82	58																
JUL 12	15:00		1.87	10.0	PS82	47																
JUL 12	21:00		1.82	10.0	PS82	35																
JUL 13	03:00		1.69	10.0	PS82	48																
JUL 13	09:00		1.64	10.0	PS82	39																
JUL 13	13:30	25.0	2.78	10.0	DH48	85		461														
JUL 14	13:30		27.5	10.0	PS82	2380																
JUL 15	13:30		3.50	10.0	PS82	239																
JUL 16	13:30		2.67	10.0	PS82	138																
JUL 17	13:30		2.47	10.0	PS82	105																
JUL 18	13:30		1.85	10.0	PS82	116																
JUL 19	13:30		1.80	10.0	PS82	98																
JUL 20	13:30		5.43	10.0	PS82	416																
JUL 30	12:30	25.0	4.84	10.0	DH48	87		511														
JUL 31	13:30		1.86	10.0	PS82	82																
AUG 01	13:30		1.51	10.0	PS82	73																
AUG 02	13:30		9.02	10.0	PS82	867																
AUG 03	13:30		3.18	10.0	PS82	694	C															
AUG 04	13:15	25.0	2.10	10.0	DH48	18		530														
AUG 05	13:30		1.86	10.0	PS82	85																
AUG 06	13:30		1.60	10.0	PS82	77																
AUG 07	13:30		1.48	10.0	PS82	58																
AUG 08	13:30		1.50	10.0	PS82	28																
AUG 09	13:30		29.6	10.0	PS82	1280																
AUG 10	13:30		3.41	10.0	PS82	494																
AUG 11	13:30		2.58	10.0	PS82	50																
AUG 12	11:45	23.0	1.85	10.0	DH48	35		593														
AUG 12	13:30		1.85	10.0	PS82	50																
AUG 13	09:00		1.60	10.0	PS82	29																
AUG 13	13:30		1.67	10.0	PS82	22																
AUG 14	13:30		1.51	10.0	PS82	29																
AUG 15	13:30		1.46	10.0	PS82	17																
AUG 16	13:30		1.42	10.0	PS82	18																
AUG 17	13:30		2.42	10.0	PS82	400																
AUG 18	13:30		1.91	10.0	PS82	241																
AUG 19	13:30		1.48	10.0	PS82	27																
AUG 20	13:30		1.38	10.0	PS82	15																
AUG 21	13:30		1.37	10.0	PS82	18																
AUG 22	13:30		1.36	10.0	PS82	15																
AUG 23	13:30		1.25	10.0	PS82	20																
AUG 24	13:30		1.02	10.0	PS82	15																
AUG 25	13:30		1.33	10.0	PS82	18																
AUG 26	13:30		1.33	10.0	PS82	15																
AUG 27	13:30		1.34	10.0	PS82	11																
AUG 28	13:30		1.33	10.0	PS82	12																
AUG 29	13:30		2.36	10.0	PS82	21																
AUG 30	13:30		1.43	10.0	PS82	11																
AUG 31	13:30		4.58	10.0	PS82	1520																
SEP 01	13:30		2.17	10.0	PS82	48																
SEP 02	11:40	16.0	1.73	10.0	DH48	20																
SEP 02	13:30		1.69	10.0	PS82	33																
SEP 03	13:30		1.43	10.0	PS82	31																
SEP 04	13:30		1.35	10.0	PS82	27																
SEP 05	13:30		1.33	10.0	PS82	21																
SEP 06	13:30		1.29	10.0	PS82	25																
SEP 07	13:30		1.31	10.0	PS82	27																
SEP 08	13:30		4.84	10.0	PS82	49																
SEP 09	13:30		4.12	10.0	PS82	42																
SEP 10	13:30		1.45	10.0	PS82	28																
SEP 11	13:30		1.35	10.0	PS82	170																
SEP 12	13:30		1.88	10.0	PS82	41																
SEP 13	13:30		1.84	10.0	PS82	1410																
SEP 14	13:30		2.61	10.0	PS82	78																
SEP 15	13:30		1.78	10.0	PS82	38																
SEP 16	13:30		1.48	10.0	PS82	38																
SEP 17	13:30		4.26	10.0	PS82	132																
SEP 18	13:30		9.02	10.0	PS82	75																
SEP 19	13:30		3.72	10.0	PS82	160																
SEP 20	13:30		8.81	10.0	PS82	85																
SEP 21	13:30		21.0	10.0	PS82	828																
SEP 22	13:30		7.17	10.0	PS82	155																
SEP 23	13:30		3.58	10.0	PS82	45																
SEP 24	13:30		1.73	10.0	PS82	48																
SEP 25	09:05	10.0	1.43	10.0	DH48	8		858														
SEP 25	09:05	10.0	1.43	10.0	PS82	38																
SEP 27	09:30		1.50	10.0	PS82	45																
SEP 28	09:30		4.20	10.0	PS82	344																
SEP 29	09:30		2.08	10.0	PS82	47																
OCT 15	10:30	13.0	1.31	10.0	DH48	11		800														
NOV 03	11:05	8.0	1.98	10.0	DH48	21		882														
NOV 04	09:20		2.24	10.0	DH48	18		491														
NOV 05	09:30		1.67	10.0	PS82	38																
NOV 06	09:30		1.50	10.0	PS82	37																
NOV 07	09:30		1.50	10.0	PS82	33																
NOV 08	09:30		3.20	10.0	PS82	35																
NOV 09	09:30		5.52	10.0	PS82	81																
NOV 10	09:30		2.17	10.0	PS82	49																
NOV 11	09:30		1.78	10.0	PS82	38																
NOV 12	09:30		1.67	10.0	PS82	34																

NOTE : SINGLE VERTICAL LOCATED AT 10 METRES FOR 1987

CONCENTRATION SYMBOL(S): C - COARSE MATERIAL PRESENT

CONTINUED

DON RIVER AT TODMORDEN - STATION NO. 02HC024 (CONTINUED)

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
NOV 13	09:30		1.55	10.0	PS82	36															
NOV 14	09:30		1.50	10.0	PS82	52															
NOV 15	09:30		1.48	10.0	PS82	31															
NOV 16	09:30		1.43	10.0	PS82	33															
NOV 17	09:30		1.50	10.0	PS82	31															
NOV 18	09:30		3.50	10.0	PS82	81															
NOV 19	09:30		2.10	10.0	PS82	47															
NOV 20	09:30		2.14	10.0	PS82	35															
NOV 23	09:30		1.50	10.0	PS82	34															
NOV 24	09:30		1.80	10.0	PS82	26															
NOV 25	09:30		4.82	10.0	PS82	98															
NOV 26	09:30		7.53	10.0	PS82	368															
DEC 12	15:10		3.43	10.0	PS82	85															
DEC 13	15:10		2.23	10.0	PS82	86															
DEC 14	15:10		1.98	10.0	PS82	53															
DEC 15	15:10		16.8	10.0	PS82	102															
DEC 16	12:00		7.86	10.0	DH48	52	1120														
DEC 16	12:00		7.86	10.0	PS82	55															
DEC 16	15:10		7.80	10.0	PS82	43															
DEC 17	15:10		3.50	10.0	PS82	37															
DEC 18	13:45		2.89	10.0	DH48	10	792														
DEC 18	13:45		2.89	10.0	PS82	46															
DEC 18	15:10		2.85	10.0	PS82	38															
DEC 19	15:10		2.23	10.0	PS82	55															
DEC 20	15:10		30.7	10.0	PS82	129															
DEC 21	15:10		7.53	10.0	PS82	72															
DEC 22	15:10		6.89	10.0	PS82	43															
DEC 23	15:10		5.21	10.0	PS82	48															
DEC 25	15:10		6.40	10.0	PS82	56															
DEC 26	15:10		3.89	10.0	PS82	40															
DEC 27	15:10		3.27	10.0	PS82	47															
DEC 28	15:10		2.93	10.0	PS82	49															
DEC 30	15:10		2.17	10.0	PS82	83															

NOTE : SINGLE VERTICAL LOCATED AT 10 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	---P-PP-PCCC	DUAL	1 270 NOV 4	6 OCT 30	2 800 NOV 04	8 770	---	---	---
1986	CCCCCCCCCCCC	DUAL	6 630 SEP 11 *	3 FEB 13 *	64 600 SEP 11 *	187 000 *	457	457	---
1987	CCCCCCCCCCCC	DUAL	2 380 JUL 14	8 MAR 18	2 150 JUL 14	27 800	76.2	267	71.3

DUAL - MANUAL AND AUTOMATIC SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

ETOBICOKE CREEK BELOW QUEEN ELIZABETH HIGHWAY - STATION NO. 02HC030

LOCATION: LAT 43 36 02 N LONG 079 33 24 W
DRAINAGE AREA: 204 km^2
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
FEB 18	10:30	0.1	0.383 W	13.0	DH48	11	1450														
MAR 12	09:45		1.32	13.0	DH48	10	777														
MAR 23	10:30	1.0	1.23	13.0	DH48	8	684														
APR 15	08:25	6.0	2.20	13.0	DH48	8	682														
MAY 26	08:40	10.0	0.309	13.0	DH48	4	785														
JUN 19	13:40	25.0	0.311	13.0	DH48	15	724														
JUL 03	11:10		0.708	13.0	DH48	18															
JUL 21	15:00	25.0	1.25	13.0	DH48	61	678														
AUG 13	07:35		0.433	13.0	DH48	11	673														
SEP 08	11:25	20.0	3.54	13.0	DH48	80	626														
OCT 13	10:00	12.0	0.318	13.0	DH48	3	695														
OCT 15	08:45		0.418	13.0	DH48	4															
NOV 03	08:30	8.0	0.441	13.0	DH48	3	719														
DEC 09	14:30	7.0	6.58	13.0	DH48	377	845	23	26	57	93	99	100						6	74	20

NOTE : SINGLE VERTICAL LOCATED AT 13 METRES FOR 1987

DISCHARGE SYMBOL(S): W - DAILY MEAN; ICE CONDITIONS

ETOBICOKE CREEK BELOW QUEEN ELIZABETH HIGHWAY - STATION NO. 02HC030

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY MEAN LOAD (TONNES)	SUMMARY HISTORICAL MEAN LOAD (TONNES)	SUMMARY STANDARD ERROR OF MEAN %
1985	---P-PPPPPPP	MANUAL	863	AUG 28	3	OCT 31 *	---	---	---	---	---	---
1986	-PPPP-PPPPPP	MANUAL	1 100	SEP 11 *	5	APR 11	---	---	---	---	---	---
1987	-PPPPPPPPPPP	MANUAL	377	DEC 9	3	OCT 13	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

FAIRCHILD CREEK NEAR BRANTFORD - STATION NO. 02GB007

LOCATION: LAT 43 08 49 N LONG 080 09 18 W
DRAINAGE AREA: 360 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. DISSOLVED CONCENT. (mg/L)	SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 06	10:30	5.0	52.7	12.0	DH59	255	303														
APR 07	11:00	5.0	48.3	12.0	DH59	86	274														
MAY 01	12:30	12.0	1.87	8.0 X	DH59	56	361														
JUN 17	08:50	22.0	0.455	12.0	DH48	102	392														
SEP 01	08:30	18.0	0.550	12.0	DH48	54	462														
OCT 22	12:35	8.0	0.877	12.0	DH48	33	424														
NOV 23	12:25	2.0	1.28	12.0	DH48	14	504														

NOTE : SINGLE VERTICAL LOCATED AT 12 METRES FOR 1987

VERTICAL SYMBOL(S): X - NOT AT REGULAR SINGLE SAMPLE VERTICAL

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY MEAN LOAD (TONNES)	SUMMARY HISTORICAL MEAN LOAD (TONNES)	SUMMARY STANDARD ERROR OF MEAN %
1985	--P-P-P---P-	MANUAL	188	MAR 13	36	MAY 9	---	---	---	---	---	---
1986	--PP-PP--P--	MANUAL	193	OCT 1	39	APR 10	---	---	---	---	---	---
1987	---PPP--PPP-	MANUAL	255	APR 6 *	14	NOV 23 *	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

SARARASKA RIVER ABOVE DALE - STATION NO. 02HD012

LOCATION: LAT 43 59 28 N LONG 079 19 43 W
DRAINAGE AREA: 232 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. DISSOLVED CONCENT. (mg/L)	SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 14	07:50		3.84	8.5	DH48	61	318														
JUN 16	10:45	18.0	2.22	8.5	DH48	35	270														
JUL 08	08:15	22.0	3.03	8.5	DH48	108	322														
AUG 13	07:40	18.0	1.63	8.5	DH48	27	362														
SEP 15	13:10	16.0	1.91	8.5	DH48	26	328														
OCT 20	09:15	8.0	2.21	8.5	DH48	13	385														
NOV 04	13:50	11.0	3.03	8.5	DH48	11	395														

NOTE : SINGLE VERTICAL LOCATED AT 8.5 METRES FOR 1987

ONTARIO

CANARASKA RIVER ABOVE DALE - STATION NO. 02HD012

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	-PPPP---PPPP	MANUAL	976 MAR 12		3 DEC 11 *		---	---	---	---	---	---
1986	--P-P--P----	MANUAL	1 100 MAR 19 *		17 MAY 13		---	---	---	---	---	---
1987	---P-PPPPPP-	MANUAL	105 JUL 9		11 NOV 4		---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

GOULAIS RIVER NEAR SEARCHMONT - STATION NO. 02BF002

LOCATION: LAT 48 51 37 N LONG 083 58 18 W
DRAINAGE AREA: 1 180 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED APR 1988

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 16	08:40	5.0	61.0	23.0	D48	12	155														
JUN 10	12:54	18.0	8.58	23.0	D48	16	162														
AUG 25	15:42	19.0	4.88	23.0	SURF	21 C	197														
OCT 08	10:58	8.5	8.18	23.0	D48	8	196														
NOV 11	15:20	0.5	14.1	23.0	DH59	21	168														

NOTE : SINGLE VERTICAL LOCATED AT 23 METRES FOR 1987

CONCENTRATION SYMBOL(S): C - ORGANIC MATERIAL PRESENT

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1986	---P-P------	MANUAL	38 APR 8 *		3 JUN 11 *		---	---	---	---	---	---
1987	---P-P-P-PP-	MANUAL	21 AUG 25		9 OCT 8		---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

GRAVEL RIVER NEAR CAVERS - STATION NO. 02AE001

LOCATION: LAT 48 55 34 N LONG 087 41 27 W
DRAINAGE AREA: 818 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 30	08:15	4.0	9.22	14.0	D48	5	68														
JUN 19	11:00		3.52	14.0	D48	12 C	175														
SEP 04	10:50	4.0	1.78	14.0	SURF	1															

NOTE : SINGLE VERTICAL LOCATED AT 14 METRES FOR 1987

CONCENTRATION SYMBOL(S): C - ORGANIC MATERIAL PRESENT

GRAVEL RIVER NEAR CAVERS - STATION NO. 02AE001

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	SUMMARY : HISTORICAL MEAN LOAD (TONNES)	SUMMARY : HISTORICAL STANDARD ERROR OF MEAN %
1985	------P-PP--	MANUAL	2	SEP 11	1	JUL 12 *	---	---	---	---	---	---
1986	---P--P-----	MANUAL	15	APR 24 *	4	JUL 30	---	---	---	---	---	---
1987	---P-P--P---	MANUAL	12	JUN 19	1	SEP 4	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

GRINDSTONE CREEK NEAR ALDERSHOT - STATION NO. 02HB012

LOCATION: LAT 43 18 03 N LONG 079 52 10 W
DRAINAGE AREA: 82.6 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JUL 17	11:30	23.0	0.198	MID	DH48	14	548														

NOTE : SINGLE VERTICAL LOCATED AT MID (MID STREAM) FOR 1987

HIGHLAND CREEK NEAR WEST HILL - STATION NO. 02HC013

LOCATION: LAT 43 46 45 N LONG 079 10 26 W
DRAINAGE AREA: 88.1 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
FEB 23	10:35	0.1	0.671	12.0	DH48	10	1050														
MAR 13	09:45	1.0	0.720	12.0	DH48	34	1040														
APR 15	12:15	10.0	0.758	12.0	DH48	30	758														
MAY 27	10:15	15.0	0.506	12.0	DH48	6	586														
JUN 17	08:25	20.0	0.409	12.0	DH48	8	757														
JUL 13	08:25		0.381	12.0	DH48	6	688														
AUG 11	13:05	22.0	0.357	12.0	DH48	4	646														
SEP 09	10:50	20.0	0.550	13.0	DH48	7	506														
OCT 14	10:15	10.0	0.378	13.0	DH48	53	723														
NOV 04	12:40	8.0	0.488	12.0	DH48	4	448														
DEC 01	15:45	1.0	0.804	12.0	DH48	37	734														
DEC 10	12:15	5.0	0.770	12.0	DH48	15	593														

NOTE : SINGLE VERTICAL LOCATED AT 12 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	SUMMARY : HISTORICAL MEAN LOAD (TONNES)	SUMMARY : HISTORICAL STANDARD ERROR OF MEAN %
1985	---P-PP-PPPP	MANUAL	688	SEP 28 *	0	JUN 11 *	---	---	---	---	---	---
1986	-PPPPPPPPPPP	MANUAL	478	MAR 15	2	NOV 25	---	---	---	---	---	---
1987	-PPPPPPPPPPP	MANUAL	53	OCT 14	4	AUG 11	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

ONTARIO

NUMBER RIVER AT ELDER MILLS - STATION NO. 02HC023

SUSPENDED SEDIMENT FOR 1987

LOCATION: LAT 43 46 39 N LONG 78 37 38 W
DRAINAGE AREA: 303 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

TOTAL SUSPENDED SEDIMENT LOAD IS 900 TONNES FOR THE PERIOD JAN 01 TO DEC 31

REMARKS:OPEN WATER SAMPLING ONLY

	JAN			FEB			MAR			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	2.32	62	8.42	0.890 B	43	3.31	3.00 B	182 S	47.2	1
2	2.28	36	7.49	1.20 B	44	4.58	8.00 B	350	181	2
3	2.09	43	7.78	1.70 B	53	7.78	8.02 B	144	74.9	3
4	1.35	39	4.55	1.50 B	45	5.83	5.20 B	85	43.7	4
5	2.08	52	8.36	1.35 B	42	4.90	4.60 B	93	36.2	5
6	2.33	61	12.3	1.20 B	40 S	4.15	4.00 B	87 S	30.1	6
7	2.37	86 S	13.9	1.30 B	43	4.63	7.00 B	427 S	258	7
8	1.95	61	10.3	1.60 B	58	8.02	18.0 B	1 840 S	2 240	8
9	2.08	52	9.26	1.43 B	47	5.81	18.0 B	618	1 340	9
10	1.82	46	7.86	1.38 B	37	4.41	8.89 B	292	219	10
11	2.02	39	6.81	1.30 B	31	3.48	5.19 B	188	85.5	11
12	2.05	30	5.31	1.25 B	24 S	2.59	5.32 B	128	62.1	12
13	1.89	29	4.98	1.18 B	14	1.43	6.26 B	147	84.4	13
14	1.80 B	38	5.40	1.12 B	14	1.35	3.73 B	129 S	41.8	14
15	2.08 B	36	8.28	1.08 B	18	1.69	3.80 B	131	40.7	15
16	2.03 B	40 S	7.02	1.05 B	18	1.63	3.90 B	104 S	31.4	16
17	1.60 B	30	2.42	1.02 B	20 S	1.76	3.85 B	114	38.0	17
18	1.80 B	18	2.85	0.980 B	23	1.95	3.88 B	115 S	38.4	18
19	1.70 B	11	1.62	0.970 B	30	2.51	4.10 B	97	34.4	19
20	1.33 B	18 S	2.07	0.950 B	35 S	2.87	4.38 B	91	33.7	20
21	1.25 B	16	1.73	0.930 B	28	2.25	4.50 B	89	36.5	21
22	1.21 B	23	2.40	0.910 B	17	1.34	4.83	161 S	67.2	22
23	1.17 B	41 S	4.14	0.890 B	17	1.31	5.32	154 S	70.8	23
24	1.10 B	18	1.71	0.870 B	14	1.05	5.35	122	56.4	24
25	1.08 B	13	1.19	0.850 B	14	1.03	5.34	105	48.4	25
26	1.01 B	13	1.12	0.840 B	12	0.87	5.38	105	51.0	26
27	0.980 B	15	1.27	0.820 B	12	0.85	5.11	163 S	65.0	27
28	0.870 B	13	1.01	0.810 B	28 S	1.82	5.16	151	67.8	28
29	0.840 B	17	1.38				4.53	134	52.4	29
30	0.820 B	41	2.96				5.83	215 S	105	30
31	0.800 B	51 S	3.97				7.48	254 S	164	31
TOTAL	50.540		180.37	31.420		85.38	184.57		5 787.8	TOTAL

	APR			MAY			JUN			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	6.20	123 S	65.8	2.31	27 S	5.39	1.47	21	2.67	1
2	8.23	84	60.6	2.11	22	4.01	1.78	36	5.28	2
3	5.87	87 S	44.9	2.01	30	3.47	1.83	18	2.63	3
4	6.03	115	59.9	1.96	15	2.54	1.40	14	1.88	4
5	20.3	2 530 S	4 440	2.07	17 S	3.04	1.28	15	1.87	5
6	21.8	1 290 S	2 410	1.93	14	2.33	1.28	14	1.52	6
7	16.5	701	999	1.86	16	2.49	1.30	18	2.02	7
8	10.1	349	305	1.73	16	2.39	1.48	53	6.78	8
9	6.65	184	88.5	1.70	17	2.50	1.45	39	7.39	9
10	5.22	61 S	27.5	1.84	17	2.41	1.34	51 S	5.90	10
11	4.44	33	8.82	1.85	15	2.26	1.33	42	4.83	11
12	4.01	20	8.83	1.88	17 S	3.47	1.37	46	5.44	12
13	4.39	25	11.0	1.80	16	2.87	3.12	215	58.0	13
14	4.28	30	7.40	1.87	12	1.83	2.86	200 S	48.0	14
15	4.30	28	9.85	2.04	46	8.11	1.73	121	18.1	15
16	4.38	28	9.78	2.00	42	7.28	1.44	81 S	10.1	16
17	3.73	24	7.73	1.74	20	3.01	1.35	88	7.18	17
18	3.38	28	7.58	1.61	17	2.38	1.30	57	5.91	18
19	3.46	32	9.82	1.61	18	2.84	1.14	48	4.83	19
20	3.85	28	8.85	1.61	24	3.38	1.10	38	3.42	20
21	3.78	32 S	9.30	1.84	42	6.95	1.09	24	2.28	21
22	3.75	31 S	8.01	1.73	47 S	7.02	1.61	43	5.81	22
23	3.85	20	4.80	1.77	41	6.27	2.30	131	24.9	23
24	2.54	20	4.38	1.84	21	4.38	1.75	74	11.2	24
25	2.44	18	3.78	1.58	23	3.00	1.38	50 S	5.89	25
26	2.32	16	3.61	1.86	22	3.19	1.25	53	5.72	26
27	3.35	19	3.89	2.20	53	10.1	1.20	42	4.35	27
28	3.36	33	8.78	1.90	29	4.78	1.20	48	4.98	28
29	3.55	35 S	7.74	1.80	28 S	4.04	1.15	34 S	3.38	29
30	2.82	40	8.71	1.82	21	3.84	1.17 E	34 S	3.44	30
31				1.47	19	2.18				31
TOTAL	169.44		8 629.82	55.40		119.57	44.84		272.87	TOTAL

B - ICE CONDITIONS E - ESTIMATED S - SAMPLE(S) COLLECTED THIS DAY

NUMBER RIVER AT ELDER MILLS - STATION NO. 02HC025

SUSPENDED SEDIMENT FOR 1987

DAY	JUL DAILY DISCHARGE (m^3/s)	JUL MEAN CONCENTRATION (mg/L)	JUL DAILY LOAD (t)	AUG DAILY DISCHARGE (m^3/s)	AUG MEAN CONCENTRATION (mg/L)	AUG DAILY LOAD (t)	SEP DAILY DISCHARGE (m^3/s)	SEP MEAN CONCENTRATION (mg/L)	SEP DAILY LOAD (t)	DAY
1	1.17	34	3.44	1.01	12	1.05	1.08	24	2.20	1
2	1.17	45	4.55	1.12	26	2.62	1.09	26	2.64	2
3	1.26	56	6.77	1.55	53	8.44	1.06	23 S	2.11	3
4	1.45	53	6.64	1.44	57	7.09	1.04	20	1.80	4
5	1.42	52	6.38	1.21	42 S	4.39	1.02	18	1.59	5
6	1.53	68 S	8.59	1.15	35	3.58	1.02	14	1.23	6
7	2.87	166	41.2	1.11	30	2.88	1.02	14	1.23	7
8	2.45	115 S	24.3	1.08	28	2.66	1.04	18	1.71	8
9	2.96	122 S	31.2	1.56	74	10.5	1.35	67	7.81	9
10	4.89	251 S	142	2.27	83	18.2	1.27	31 S	3.40	10
11	3.64	188	37.8	1.74	65	9.77	1.27	31	3.40	11
12	2.20	122	23.2	1.32	38	4.33	1.19	29	2.98	12
13	1.71	110	16.3	1.22	23 S	2.42	1.22	19	1.90	13
14	2.21	244	46.6	1.13	20 S	1.95	1.21	21	2.20	14
15	2.39	309 S	63.8	1.10	17	1.62	1.14	23	2.27	15
16	1.62	253	39.6	1.13	18	1.76	1.12	23	2.23	16
17	1.48	200	25.7	1.31	32	3.62	1.18	28	2.87	17
18	1.34	154	17.8	1.28	25	2.78	1.42	28 S	3.44	18
19	1.25	107	11.6	1.16	20	1.87	1.52	26	3.41	19
20	1.88	116	18.5	1.08	20 S	1.87	1.81	27	3.78	20
21	1.82	102	16.0	1.08	20	1.83	2.40	148	30.9	21
22	1.44	45	5.80	1.07	20	1.85	3.22	310 S	86.2	22
23	1.30	32 S	3.59	1.04	20	1.80	2.27	200	39.3	23
24	1.21	28	3.03	1.00	18	1.56	1.88	87	12.8	24
25	1.22	21	2.21	1.01	21	1.83	1.45	84	6.02	25
26	1.17	16	1.62	1.01	18	1.66	1.28	51	5.84	26
27	1.07	15	1.38	1.00	18	1.56	1.24	52	5.57	27
28	1.06	13	1.16	1.02	18 S	1.87	2.17	118	21.8	28
29	1.02	10	0.88	1.08	18	1.74	2.53	82 S	17.9	29
30	1.03	10 S	0.89	1.08	20	1.87	1.58	53	7.14	30
31	1.01	14	1.22	1.08	21	1.88				31
TOTAL	53.11		811.88	37.37		112.74	43.68		396.85	TOTAL

DAY	OCT DAILY DISCHARGE (m^3/s)	OCT MEAN CONCENTRATION (mg/L)	OCT DAILY LOAD (t)	NOV DAILY DISCHARGE (m^3/s)	NOV MEAN CONCENTRATION (mg/L)	NOV DAILY LOAD (t)	DEC DAILY DISCHARGE (m^3/s)	DEC MEAN CONCENTRATION (mg/L)	DEC DAILY LOAD (t)	DAY
1	1.48	55	7.03	1.73	15	2.38	5.30	117	53.6	1
2	1.54	50	6.85	1.61	13	1.81	3.89	54	18.6	2
3	1.41	38	4.83	1.83	12	1.89	3.09	31	8.26	3
4	1.33	34	3.91	1.59	8	1.24	2.50	20	4.32	4
5	1.35	31	3.62	1.52	7 S	0.82	2.17	15	2.81	5
6	1.35	31	3.62	1.48	7	0.90	1.98	14	2.40	6
7	1.36	32	3.78	1.47	6 S	0.78	1.82	77 S	10.1	7
8	1.80	35	5.38	1.51	5	0.65	2.15	80	14.8	8
9	1.84	34	5.38	1.68	8	1.28	3.36	29	8.86	9
10	1.51	28	3.65	1.70	12	1.75	4.89	114 S	45.2	10
11	1.41	26	3.17	1.53	10	1.32	4.30	76	35.0	11
12	1.38	20	2.38	1.48	8	1.15	3.45	33	8.84	12
13	1.35	11	1.28	1.51	6	1.04	3.22	36	7.79	13
14	1.33	11 S	1.26	1.57	11	1.49	2.71	18	4.21	14
15	1.28	10	1.11	1.56	8	1.21	2.67	18	3.61	15
15	1.28	12	1.33	1.48	10	1.28	2.77	13 S	2.87	16
17	1.30	9	1.01	1.83	17	2.38	2.50	12 S	2.88	17
18	1.42	8	0.88	2.19	39	6.49	1.80	13	2.02	18
19	1.48	9 S	1.14	1.96	21	3.56	2.51	28	6.04	19
20	1.43	11	1.36	1.62	12	1.89	3.04	31	8.16	20
21	1.40	9	1.08	1.35 B	6	0.86	8.54	199 S	95.3	21
22	1.48	11 S	1.38	1.47 B	7	0.89	4.38	78	26.8	22
23	1.84	18	2.85	1.62	12	1.68	3.46	29	8.82	23
24	1.81	22	3.44	1.73	13	1.78	2.84	13	3.19	24
25	2.87	55	14.4	2.24	23	4.45	3.40	38	11.2	25
26	2.82	28	8.31	3.23	40 S	11.2	4.57	83	24.9	26
27	2.47	26	5.55	3.11	24	6.45	3.07	27	7.16	27
28	3.37	60	17.8	2.57	10	2.22	3.20 B	20	3.80	28
29	2.85	39	8.83	4.36	148 S	55.8	1.35 B	16	1.87	29
30	2.03	21	3.68	8.15	213	113	1.60 B	15	2.33	30
31	1.90	19	3.12				1.85 B	15	2.40	31
TOTAL	52.43		130.81	60.65		232.49	92.85		431.08	TOTAL

B - ICE CONDITIONS

S - SAMPLE(S) COLLECTED THIS DAY

ONTARIO

NUMBER RIVER AT ELDER MILLS - STATION NO. 02HC025

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)		SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JAN 07	14:25	0.1	2.37	H	17.6	DH48	70															
JAN 15	15:10	0.1	2.03	W	17.6	DH48	39															
JAN 20	11:10	0.1	1.33		17.6	DH48	21															
JAN 23	11:25	0.1	1.17	W	17.6	DH48	48	214														
JAN 31	12:20	0.1	.800	W	17.6	DH48	67															
FEB 04	11:00	0.1	1.20	W	17.6	DH48	43															
FEB 12	11:20	0.1	1.35	W	17.6	DH48	27															
FEB 17	15:15	0.1	1.01		17.6	DH48	19															
FEB 20	13:30	0.1	.950	W	17.6	DH48	28															
FEB 28	12:30	0.1	.810	W	17.6	DH48	20															
MAR 01	11:30	0.1	3.00	W	17.6	DH48	203	228														
MAR 06	11:45	0.1	4.00	W	17.6	DH48	69															
MAR 07	16:40	0.1	7.00	W	17.6	DH59	886															
MAR 08	09:45	0.1	18.0	W	17.6	DH59	845	416														
MAR 06	12:40	0.1	16.0	W	17.6	DH59	2740	424														
MAR 14	11:30	0.1	3.73	W	17.6	DH48	84															
MAR 18	11:55	0.1	2.89		17.6	DH48	98															
MAR 18	16:50	1.0	3.66	W	17.6	DH48	114															
MAR 22	13:25	2.0	4.84		17.6	DH59	158															
MAR 23	15:50	2.0	5.45		17.6	DH59	148	325														
MAR 27	13:05	4.0	6.19		17.6	DH59	181															
MAR 27	18:10	5.0	5.89		17.6	DH59	187															
MAR 30	10:20	4.0	5.22		17.6	DH59	210															
MAR 31	18:30	1.0	7.06		17.6	DH59	183															
APR 01	18:50	2.5	6.52		17.6	DH59	113															
APR 03	15:45	5.0	6.01		17.6	DH59	84															
APR 05	10:00	3.0	22.5		17.6	DH59	2830	302	7	11	20	32	58	72	94	97	100			28	61	11
APR 08	16:20	5.0	20.3		17.6	DH59	813	288														
APR 08	19:10	5.0	20.4		17.6	DH59	897	279														
APR 10	13:30	9.0	5.25		17.6	DH48	78															
APR 10	16:30	12.5	4.34		17.6	DH48	35															
APR 21	15:25	20.0	2.73		17.6	DH48	21															
APR 22	08:35	14.0	2.82		17.6	DH48	19															
APR 28	13:30	11.5	2.58		17.6	DH48	34															
MAY 01	13:15	8.0	2.44		17.6	DH48	25															
MAY 05	10:45	12.0	1.97		17.6	DH48	15															
MAY 12	14:45	21.5	1.74		17.6	DH48	18															
MAY 22	08:35	22.0	1.81		17.6	DH48	51															
MAY 29	07:45	21.0	1.67		17.6	DH48	30															
JUN 10	10:50	16.5	1.36		17.6	DH48	49															
JUN 14	07:45	19.5	2.82		17.6	DH48	214															
JUN 15	11:20	20.0	1.45		17.6	DH48	60															
JUN 25	13:10	24.5	1.39		17.6	DH48	49															
JUN 29	14:45	22.5	1.18		17.6	DH48	32															
JUN 30	11:10	22.0	1.25		17.6	DH48	39															
JUL 06	12:50	24.0	1.37		17.6	DH48	53															
JUL 08	09:50	24.0	2.18		17.6	DH48	113															
JUL 09	13:45	25.5	3.69		17.6	DH48	192	386														
JUL 10	12:00	25.0	8.13		17.6	DH48	693															
JUL 15	09:45	18.0	2.57		17.6	DH48	313															
JUL 23	09:10	25.0	1.31		17.6	DH48	33															
JUL 30	12:00	26.0	1.04		17.6	DH48	12															
AUG 05	08:50		1.31		17.6	DH48	42															
AUG 13	14:30	23.0	1.21		17.6	DH48	20															
AUG 14	10:20	23.0	1.23		17.6	DH48	23															
AUG 20	11:10	22.0	1.10		17.6	DH48	20	376														
AUG 28	13:30	17.5	1.01		17.6	DH48	19															
SEP 03	11:00	15.5	1.08		17.6	DH48	22															
SEP 10	12:55		1.29		17.6	DH48	25															
SEP 18	13:05	14.0	1.24		17.6	DH48	22															
SEP 22	09:40	15.0	3.14		17.6	DH48	320	387														
SEP 29	10:35	10.5	2.57		17.6	DH48	75															
OCT 14	10:15	7.0	1.48		17.6	DH48	12															
OCT 19	12:30	7.0	1.44		17.6	DH48	10															
OCT 22	10:10	8.0	1.48		17.6	DH48	10															
NOV 05	11:10	6.0	1.53		17.6	DH48	7															
NOV 07	09:30		1.53		17.6	DH48	7															
NOV 26	09:30	1.0	3.16		17.6	DH48	37															
NOV 28	15:00	4.0	4.80		17.6	DH48	181															
DEC 07	13:20	1.0	1.81		17.6	DH48	129	345														
DEC 10	11:35	5.0	4.92		17.6	DH48	135															
DEC 16	15:40	4.0	2.73		17.6	DH48	13															
DEC 17	11:10	0.5	2.20		17.6	DH48	14															
DEC 21	15:15	0.1	5.80		17.6	DH48	168	366														

NOTE : SINGLE VERTICAL LOCATED AT 17.6 METRES FOR 1987

DISCHARGE SYMBOL(S): H - DAILY MEAN W - DAILY MEAN; ICE CONDITIONS

NUMBER RIVER AT ELDER MILLS - STATION NO. 02HC026

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : JAN-DEC MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	HISTORICAL STANDARD ERROR OF MEAN %
1965	--CCCCCCCCCC	MANUAL	470	MAR 01	7	MAY 12	288	MAR 01	4 290	---	---	---
1967	CCCCCCCCCCCC	MANUAL	1 850	JUL 09	13	OCT 05	5 000	APR 03	23 800	85.3	85.3	---
1968	CCCCCCCCCCCC	MANUAL	1 330	AUG 23	8	OCT 23	3 430	MAR 19	22 100	80.4	82.9	3.9
1969	CCCCCCCCCCCC	MANUAL	2 280	APR 18	10	JUN 13	4 280	APR 18	24 800	87.3	84.3	3.2
1970	CCCCCCCCCCCC	MANUAL	2 430	MAY 28	6	SEP 23	1 230	APR 09	8 730	23.8	84.2	18.8
1971	CCCCCCCCCCCC	MANUAL	1 800	APR 02	10	NOV 10	2 440	APR 02	12 800	34.3	80.3	17.7
1972	CCCCCCCCCCCC	MANUAL	1 920	APR 11	8	SEP 25	4 420	APR 14	23 800	84.8	82.7	14.5
1973	CCCCCCCCCCCC	MANUAL	2 900	MAR 08	7	OCT 18	4 030	MAR 08	28 100	71.5	85.4	13.6
1974	CCCCCCCCCCCC	MANUAL	2 100	MAY 17	8	OCT 18	5 990	MAR 05	32 100	87.9	89.4	12.3
1975	CCCCCCCCCCCC	MANUAL	3 710	APR 18	6	OCT 10	12 000	APR 18 *	34 100	93.4	83.2	11.8
1976	CCCCCCCCCCCC	MANUAL	3 610	MAR 20	8	OCT 18	7 880	MAR 20	37 400	102	87.1	11.6
1977	CCCCCCCCCCCC	MANUAL	2 170	SEP 25	15	MAR 07	3 350	OCT 02	31 000	84.8	88.7	10.4
1978	CCCCCCCCCCCC	MANUAL	3 320	APR 01	10	OCT 23	6 630	APR 01	39 800 *	109	72.1	10.2
1979	CCCCCCCCCCCC	MANUAL	1 850	MAR 14	10	SEP 10	3 610	MAR 05	32 200	88.3	73.3	9.4
1980	CCCCCCCCCCCC	MANUAL	3 280	APR 18	14	MAR 05	9 280	APR 18	38 100	71.2	73.2	8.7
1981	CCCCCCCCCCCC	MANUAL	804	JUL 08	6	APR 23	4 700	FEB 19	20 000	54.7	71.8	8.4
1982	CCCCCCCCCCCC	MANUAL	2 380	MAR 31	8	OCT 19	7 850	MAR 31	35 200	88.7	73.5	8.0
1983	CCCCCCCCCCCC	MANUAL	1 070	MAY 03	11	NOV 15	1 420	FEB 03	14 800	40.8	71.5	8.2
1984	CCCCCCCCCCCC	MANUAL	2 550	DEC 29	1	NOV 2 *	2 280	FEB 14	15 900	46.1	70.1	8.1
1985	CCCCCCCCCCCC	MANUAL	3 000	APR 5	8	SEP 24	3 930	APR 05	29 500	78.1	70.6	7.8
1986	CCCCCCCCCCCC	MANUAL	5 870	MAR 19 *	7	NOV 5	5 330	MAR 19	36 600	105	72.3	7.5
1987	CCCCCCCCCCCC	MANUAL	2 630	APR 5	7	NOV 5	4 440	APR 05	15 900	46.3	71.1	7.5

MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH

* - EXTREME FOR PERIOD OF RECORD

KEMPTVILLE CREEK NEAR KEMPTVILLE - STATION NO. 02LA008

LOCATION: LAT 44 58 38 N LONG 075 39 48 W
DRAINAGE AREA: 405 km²
TYPE OF FLOW: REGULATED SINCE 1951
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MARCH 1986

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 09	11:55	8.0	20.5	MID	D49	4	208														
MAY 27	11:30	21.0	1.17	MID	DN48	3	289														

NOTE : SINGLE VERTICAL LOCATED AT 7.6 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	HISTORICAL STANDARD ERROR OF MEAN %
1986	--PP-PP-P-PP	MANUAL	4	MAR 17 *	1	SEP 22 *	---	---	---	---	---	---
1987	---PP-------	MANUAL	4	APR 5	3	MAY 27	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

KETTLE CREEK AT ST. THOMAS - STATION NO. 02GC002

LOCATION: LAT 42 46 40 N LONG 081 12 52 W
DRAINAGE AREA: 339 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 18	15:30	1.0	4.63	4.0	X DH48	18	220														
APR 23	14:45	15.0	4.27	4.0	X DH48	50	395														
MAY 27	15:00	23.0	2.60	4.0	X DH48	58	486														
JUL 13	13:00	19.0	2.57	4.0	X DH48	74	438														
SEP 10	09:30	16.0	0.107	4.0	X DH48	53	388														
OCT 07	09:00	12.0	0.148	4.0	X DH48	26	434														
DEC 01	14:10	3.0	4.33	4.0	X DH48	58	480														

NOTE : SINGLE VERTICAL LOCATED AT 20 METRES FOR 1987

VERTICAL SYMBOL(S): X - NOT AT REGULAR SINGLE SAMPLE VERTICAL

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)			MINIMUM (mg/L)			SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	---PPPPP-P--	MANUAL	138	AUG 29		28	MAY 7		---	---	---	---	---	---
1986	--P-PPPPPPP-	MANUAL	931	MAR 19	*	8	NOV 6	*	---	---	---	---	---	---
1987	---PPP-P-PP-P	MANUAL	74	JUL 13		18	MAR 18		---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

LITTLE OTTER CREEK NEAR STRAFFORDVILLE - STATION NO. 02GC015

LOCATION: LAT 42 49 23 N LONG 080 48 28 W
DRAINAGE AREA: 104 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 14	13:30	9.0	2.70	3.0	DH48	222	337														
MAY 28	13:30	16.0	0.843	3.0	DH48	57	351														
JUL 15	12:30	19.0	0.603	3.0	DH48	50	346														
SEP 09	14:15	15.0	0.570	3.0	DH48	43	342														
OCT 07	13:00	12.0	0.519	3.0	DH48	27	293														

NOTE : SINGLE VERTICAL LOCATED AT 3.0 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)			MINIMUM (mg/L)			SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	-PPPPP-P-PPP	MANUAL	936	NOV 6		32	MAY 9		---	---	---	---	---	---
1986	--PPP-PPP---	MANUAL	2 050	MAR 19	*	88	AUG 18		---	---	---	---	---	---
1987	---PP-P-PP--	MANUAL	333	APR 14		37	OCT 7	*	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

LITTLE PIC RIVER NEAR COLDWELL - STATION NO. 02BA003

LOCATION: LAT 48 50 57 N LONG 086 36 26 W
DRAINAGE AREA: 1 320 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 24	09:00		27.4	MID	D48	102	188														
JUN 18	14:15		6.96	MID	DH59	28	208														

NOTE : SINGLE VERTICAL LOCATED AT MID (MID STREAM) FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	TOTAL FOR PERIOD (TONNES)	SUMMARY MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1987	---P-P------	MANUAL	102	APR 24 *	28	JUN 18 *	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

LYN CREEK NEAR LYN - STATION NO. 02MB008

LOCATION: LAT 44 31 30 N LONG 075 48 19 W
DRAINAGE AREA: km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 08	16:15	8.0	3.62	MID	DH48	4	256														
JUN 05	09:50	20.0	0.279	MID	DH48	4	316														
JUL 23	08:50	24.0	0.231	MID	DH48	6	256														
OCT 22	09:55	8.0	0.550	MID	DH48	2	276														
NOV 26	10:15	1.0	1.26	MID	DH48	3	274														

NOTE : SINGLE VERTICAL LOCATED AT MID (MID STREAM) FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	TOTAL FOR PERIOD (TONNES)	SUMMARY MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1987	---P-PP--PP-	MANUAL	8	JUL 23 *	2	OCT 22 *	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

LYNDE CREEK NEAR WHITBY - STATION NO. 02HC018

LOCATION: LAT 43 52 32 N LONG 078 57 43 W
DRAINAGE AREA: 106 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MARCH 1986

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 08	10:15		3.74	3.0	DH59	236	306														
MAY 21	14:15	8.0	0.310	3.0	DH48	14	374														
JUN 10	11:00	16.0	0.384	3.0	DH48	25	376														
JUL 20	10:15	22.0	0.699	3.0	DH48	93	319														
AUG 13	12:45	27.0	0.188	3.0	DH48	62	351														
OCT 22	10:00	6.0	0.340	3.0	DH48	27	343														
NOV 02	10:30	6.0	0.384	3.0	DH48	21	368														
NOV 05	11:30	5.0	0.580	3.0	DH48	22	389														
DEC 09	14:00	3.0	0.672	3.0	DH48	24	397														

NOTE : SINGLE VERTICAL LOCATED AT 3.0 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1986	--P-P---P---	MANUAL	3 280	MAR 19 *	10	MAY 13 *	---	---	---	---	---	---
1987	---PPPPP-PPP	MANUAL	236	APR 8	14	MAY 21	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

MAD RIVER NEAR GLENCAIRN - STATION NO. 02ED005

LOCATION: LAT 44 15 15 N LONG 080 00 07 W
DRAINAGE AREA: 395 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MAR 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 17	12:30	0.5	4.03	10.0	DH48	68	333														
APR 07	13:10	3.0	19.8	10.0	DH59	317	289														
MAY 05	12:45	8.0	3.38	10.0	DH48	8	316														
MAY 26	08:10	10.0	3.04	10.0	DH48	9	372														
JUN 08	11:00	16.0	1.13	10.0	DH48	18	304														
JUL 29	12:20	23.0	1.69	10.0	DH48	28	353														
SEP 10	13:30	16.0	1.01	10.0	DH48	18	353														
SEP 28	13:00	10.0	1.33	10.0	DH48	9	358														
OCT 13	11:50	10.0	1.33	10.0	DH48	17	235														
NOV 24	13:00	1.0	4.48	10.0	DH48	139	336														
NOV 30	13:10	2.0	7.43	10.0	DH48	142	315														

NOTE : SINGLE VERTICAL LOCATED AT 10 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1987	--PPPPP-PPP-	MANUAL	317	APR 7 *	8	MAY 5 *	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

MCGREGOR CREEK NEAR CHATHAM - STATION NO. 02GE007

LOCATION: LAT 42 23 00 N LONG 082 05 39 W
DRAINAGE AREA: 202 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 16	15:15	1.0	0.633	MID	DH48	187	500														
APR 06	10:00	8.0	3.12	MID	DH59	118															
APR 15	14:00	8.0	1.02	MID	DH59	65															
MAY 26	08:40	16.0	0.168	MID	DH59	216	558														
JUL 14	11:25		0.078	MID	DH48	278	535														
AUG 12	09:30		0.240	MID	DH48	234	618														
SEP 16	07:50	16.0	0.620	MID	DH48	138	708														
OCT 21	13:30		0.225	MID	DH48	88	548														
NOV 03	09:30	10.0	1.43	MID	DH48	353	610														
NOV 21	14:25	6.0	0.335	MID	DH48	68	558														

NOTE : SINGLE VERTICAL LOCATED AT MID (MID STREAM) FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY MEAN LOAD (TONNES)	SUMMARY HISTORICAL MEAN LOAD (TONNES)	SUMMARY STANDARD ERROR OF MEAN %
1986	--CCCPP-PP--	MANUAL	1 930 MAR 18 *	50 APR 1 *	3 480 MAR 18 *	15 000 *	---	---	---
1987	--PPP-PPPPP-	MANUAL	353 NOV 3	65 APR 15	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

MISSISSAGI RIVER AT MISSISSAGI CHUTE - STATION NO. 03CC008

LOCATION: LAT 48 12 04 N LONG 083 01 32 W
DRAINAGE AREA: 9 300 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: MANUAL

REMARKS: PROGRAM STARTED 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
AUG 28	09:20	18.5	25.1	MID	SURF	37	138														
OCT 06	11:42	15.0	24.0	MID	SURF	35	187														
NOV 12	11:35	5.5	30.6	MID	SURF	31	125														
DEC 16	14:03	1.5	90.6	MID	SURF	14	107														

NOTE : SINGLE VERTICAL LOCATED AT 64 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY MEAN LOAD (TONNES)	SUMMARY HISTORICAL MEAN LOAD (TONNES)	SUMMARY STANDARD ERROR OF MEAN %
1987	-------P-PPP	MANUAL	37 AUG 28 *	14 DEC 16 *	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

MOOSE RIVER ABOVE MOOSE RIVER - STATION NO. 04LG004

LOCATION: LAT 50 44 36 N LONG 081 27 30 W
DRAINAGE AREA: 60 100 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: MANUAL

REMARKS: REPLACES 04LG002 'MOOSE RIVER AT MOOSE RIVER' EFFECTIVE JAN 01 1983

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAY 01	07:35	4.0	1090	320	D49	89	485														
JUL 28	13:30	18.0	1350	180 X	D49	147 G	217														
NOV 06	14:30	1.0	587	180 X	D49	87	223														

NOTE : SINGLE VERTICAL LOCATED AT 320 METRES FOR 1987

CONCENTRATION SYMBOL(S): G - ORGANIC MATERIAL PRESENT

VERTICAL SYMBOL(S): X - NOT AT REGULAR SINGLE SAMPLE VERTICAL

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1978	------P-----		20	JUL 05	7	AUG 23 *	---	---	---	---	---	---
1983	----P--P-P--	MANUAL	11	MAY 30			---	---	---	---	---	---
1984	----P--P-P--	MANUAL	78	MAY 10	45	AUG 17	---	---	---	---	---	---
1985	-------P----	MANUAL	63	AUG 17	63	AUG 17	---	---	---	---	---	---
1986	----P-P-----	MANUAL	80	MAY 5	42	JUL 11	---	---	---	---	---	---
1987	----P-P---P-	MANUAL	147	JUL 28 *	87	NOV 6	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

NANTICOKE CREEK AT NANTICOKE - STATION NO. 02GC022

LOCATION: LAT 42 48 34 N LONG 080 04 36 W
DRAINAGE AREA: 161 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 15	13:30	9.0	2.61	13.0	DH48	29	291														
MAY 26	14:15	18.0	0.530	13.0	DH48	82	388														
JUL 07	13:30	23.0	0.338	13.0	DH48	121	406														
SEP 08	11:30	14.0	0.258	13.0	DH48	78	440														
OCT 08	10:30	12.0	0.284	13.0	DH48	84	403														
NOV 24	12:30	2.0	0.348	13.0	DH48	7	482														

NOTE : SINGLE VERTICAL LOCATED AT 12 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1984	-----P--P---	MANUAL	312	SEP 11	298	JUN 19	---	---	---	---	---	---
1985	-PPPPP-P-PPP	MANUAL	529	APR 1 *	10	DEC 10	---	---	---	---	---	---
1986	--PPP-P-P-P-	MANUAL	148	MAY 28	12	NOV 4	---	---	---	---	---	---
1987	---PP-P-PPP-	MANUAL	121	JUL 7	7	NOV 24 *	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

NITH RIVER NEAR CANNING - STATION NO. 02GA010

LOCATION: LAT 43 11 26 N LONG 080 27 17 W
DRAINAGE AREA: 1 030 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 08	12:00	5.0	38.1	26.0	D49	45	395														
MAY 01	10:15	10.0	6.40	10.0 X	DH48	18	440														
MAY 28	09:30	24.0	4.35	10.0 X	DH48	25	514														
JUN 17	10:40	23.0	2.83	15.0 X	DH48	38	565														
AUG 24	12:00		3.18	10.0 X	DH48	45	484														
OCT 20	13:55	7.0	2.90	10.0 X	DH48	18	495														
NOV 30	13:55	5.0	35.8	26.0	DH59	50	350														

NOTE : SINGLE VERTICAL LOCATED AT 26 METRES FOR 1987

VERTICAL SYMBOL(S): X - NOT AT REGULAR SINGLE SAMPLE VERTICAL

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1975	---P--------	MANUAL	2 520	APR 20 *	2 520	APR 20	---	---	---	---	---	---
1985	--P-P-P---P-	MANUAL	185	MAR 30	22	MAY 13	---	---	---	---	---	---
1986	--PP-P-PPP--	MANUAL	379	OCT 1	12	APR 10 *	---	---	---	---	---	---
1987	---PPP-P-PP-	MANUAL	50	NOV 30	18	MAY 1	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

NORTH THAMES RIVER NEAR THORNDALE - STATION NO. 02GD015

LOCATION: LAT 43 08 57 N LONG 081 11 30 W
DRAINAGE AREA: 1 340 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 18	10:00	2.0	30.1	17.0	DH59	8	378														
MAR 31	12:25	4.0	74.8	17.0	DH59	69	506														
APR 08	16:50	4.0	111	17.0	DH59	33	420														
APR 28	11:10	8.0	7.87	17.0	DH48	8	388														
MAY 08	12:15	11.0	3.74	17.0	DH48	7	338														
JUN 16	11:45	21.0	2.10	17.0	DH48	10	388														
JUL 28	11:25	25.0	2.88	17.0	DH48	19	337														
AUG 25	12:40	17.0	1.44	17.0	DH48	21	368														
SEP 17	09:30	17.0	2.05	17.0	DH48	11	404														
OCT 08	10:40	10.0	2.14	17.0	DH48	7	318														
NOV 18	15:20	8.0	7.79	17.0	DH48	13	378														
DEC 16	11:05	3.0	63.1	17.0	DH59	31	418														

NOTE : SINGLE VERTICAL LOCATED AT 17 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	---PPPPP-P--	MANUAL	65	AUG 30	8	MAY 8	---	---	---	---	---	---
1986	--P-PPPPPPP-	MANUAL	56	MAY 23	5	OCT 23 *	---	---	---	---	---	---
1987	--PPPPPPPPPP	MANUAL	69	MAR 31 *	5	APR 28	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

ONTARIO

NOTTAWASAGA RIVER NEAR BAXTER - STATION NO. 02ED003

SUSPENDED SEDIMENT FOR 1987

LOCATION: LAT 44 14 59 N LONG 79 49 20 W
DRAINAGE AREA: 1 180 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

TOTAL SUSPENDED SEDIMENT LOAD 72 500 TONNES FOR THE PERIOD MAR 01 TO DEC 31

REMARKS: OPEN WATER SAMPLING ONLY

	MAR			APR			MAY			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	7.20 B	57	35.5	31.2 E	283	705	9.26	28	22.4	1
2	10.0 B	58	48.4	30.3 E	229	600	8.89	23	17.3	2
3	15.2 B	31	40.7	29.4 E	211	536	8.17	17	12.0	3
4	15.0 B	25	32.4	28.3 E	170	430	7.79	18	12.8	4
5	14.7 B	43	54.8	71.1 A	1 230	7 560	7.84	19 S	12.4	5
6	13.6 B	39	46.5	105 A	1 630	14 900	7.29	15	9.45	6
7	16.0 B	162	352	71.9 E	703	4 270	7.00	11	6.85	7
8	37.0 B	2 120 S	5 780	58.0 E	345	1 670	6.85	12	7.21	8
9	87.0 B	1 740	10 100	39.3 A	203 S	689	6.62	13	7.44	9
10	52.0 B	418	1 670	30.7	136	385	6.39	10	5.52	10
11	44.0 B	320	1 220	22.3	100	193	5.26	9 S	4.87	11
12	37.0 B	247	780	17.8	78 S	120	5.33	7	3.83	12
13	32.0 B	192	531	17.6	78	120	5.26	8 S	4.33	13
14	26.0 B	170	382	16.8	86 S	98.7	5.35	12	6.84	14
15	21.5	161	299	16.4	88	140	7.54	43	31.9	15
16	17.4	131	197	16.9	85 S	119	7.34	46	30.4	16
17	16.4	111 S	157	16.7	68	66.4	8.27	21	11.4	17
18	15.8	120	172	14.8	33 S	42.5	5.94	8	4.11	18
19	15.5	121	183	13.7	26	33.1	5.89	10	5.09	19
20	21.4	161	335	12.7	27 S	29.8	5.03	11 S	5.73	20
21	23.8	226	465	11.8	27	27 S	5.23	18	9.89	21
22	27.7	248	594	10.5	22	20.0	7.77	62	41.8	22
23	33.1	321 S	918	10.4	22	19.6	9.21	117	93.1	23
24	34.8	358	1 080	10.5	23	20.9	8.03	46	33.3	24
25	34.4	290 S	852	8.88	20	17.1	7.11	17 S	10.4	25
26	38.8 E	288	1 230	8.31	19	15.3	6.84	38 S	22.5	26
27	38.5 E	290 S	965	8.08	22	17.2	7.58	72	47.8	27
28	26.3 E	195 S	443	8.82	38	33.4	7.68	59	39.1	28
29	21.0 E	145 S	283	10.5	43	39.0	8.61	41	23.4	29
30	19.7 E	143	243	8.98	31	26.7	5.78	29	14.4	30
31	22.2 E	159	306				5.18	20	8.95	31
TOTAL	820.90		30 904.1	787.82		33 029.5	218.01		585.95	TOTAL

	JUN			JUL			AUG			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	5.84	52	26.2	5.42	90	42.1	2.20	17	3.23	1
2	6.06	112	57.9	4.75	61 S	25.0	3.42	47	13.9	2
3	7.67	55	36.4	4.78	65	26.6	5.35	59 S	27.3	3
4	6.85	43	24.7	7.06	112	68.3	4.26	35	12.9	4
5	5.85	33 S	16.7	8.35	110	80.4	3.67	21	6.83	5
6	5.80	24	11.4	4.73	74	30.2	3.41	26	7.88	6
7	5.73	28	13.8	5.46	102	56.9	3.33	30	8.83	7
8	7.25	42 S	26.3	5.53	121	69.2	3.56	34	10.5	8
9	6.53	36 S	20.3	7.64	106	73.2	3.91	38	12.8	9
10	5.74	30	14.9	8.87	114	88.7	6.76	85	49.8	10
11	5.28	22	10.0	8.80	102	57.3	5.65	65	31.7	11
12	5.21	35	15.8	5.26	80 S	36.4	4.75	30	12.3	12
13	20.8	344	621	5.50	65	40.4	3.87	23 S	7.89	13
14	30.1	183	318	7.29	115	72.4	3.58	23	7.11	14
15	10.8	57 S	53.2	12.0	247	258	3.39	21	6.15	15
16	7.52	40	26.0	9.02	152	118	3.34	21	6.08	16
17	6.87	33	16.7	8.40	75	41.5	3.57	31	9.83	17
18	6.08	27	11.8	5.08	39	17.1	3.57	31	9.88	18
19	4.86	27	10.5	4.44	38	10.7	3.20	24	6.84	19
20	4.37	21	7.93	5.37	44	20.4	3.01	22	5.72	20
21	4.22	18	8.68	8.13	80	31.8	2.89	17	4.38	21
22	8.33	76	42.7	5.08	38	16.8	2.82	13	3.17	22
23	12.7	180	178	4.30	27	10.0	2.80	14	3.02	23
24	8.75	88	49.8	3.81	20	6.88	2.83	12	2.73	24
25	8.83	46	21.8	3.83	18	5.85	2.48	11	2.34	25
26	4.88	43 S	18.5	3.84	17 S	8.20	2.44	13	2.74	26
27	4.80	84	22.8	3.14	13	3.83	2.87	18	4.00	27
28	8.88	144	107	2.81	12	3.02	2.88	18	3.45	28
29	7.88	114	74.7	2.83	18 S	4.22	2.87	26	6.67	29
30	8.87	88	46.4	2.81	23	4.99	3.00	21	5.44	30
31				2.38	21	4.28	3.20	22	6.08	31
TOTAL	226.15		1 935.21	189.73		1 306.95	105.16		303.14	TOTAL

A - MANUAL GAUGE B - ICE CONDITIONS E - ESTIMATED S - SAMPLE(S) COLLECTED THIS DAY

NOTTAWASAGA RIVER NEAR BAXTER - STATION NO. 02ED003

SUSPENDED SEDIMENT FOR 1987

DAY	SEP DAILY DISCHARGE (m^3/s)	SEP MEAN CONCENTRATION (mg/L)	SEP DAILY LOAD (t)	OCT DAILY DISCHARGE (m^3/s)	OCT MEAN CONCENTRATION (mg/L)	OCT DAILY LOAD (t)	NOV DAILY DISCHARGE (m^3/s)	NOV MEAN CONCENTRATION (mg/L)	NOV DAILY LOAD (t)	DAY
1	3.42	25	7.39	5.06	55	24.5	5.73	30	14.9	1
2	3.38	27	7.88	4.87	55	23.1	5.55	28	12.5	2
3	3.28	26	7.37	4.45	43 S	16.8	5.54	23 S	11.0	3
4	3.05	19	5.01	4.24	34	12.5	5.75	30	14.9	4
5	2.89	16	4.00	4.09	27	9.54	5.80	28	14.5	5
6	2.85	15	3.69	3.95	25 S	8.53	5.80	24	12.0	6
7	2.84	16	3.93	4.21	36	13.1	6.04	28	15.1	7
8	2.85	19	4.68	5.38	54	25.0	6.83	43	25.4	8
9	2.85	25	6.37	5.87	51	24.5	9.37	88	88.8	9
10	2.88	20 S	5.11	4.87	41 S	17.6	8.93	46 S	35.5	10
11	2.85	20 S	4.92	4.50	24	9.33	7.22	28	17.5	11
12	2.84	16	4.08	4.36	13	4.90	6.40	24	13.3	12
13	3.05	11	2.90	4.28	15 S	5.92	6.07	25	13.1	13
14	3.08	14 S	3.70	4.23	25	9.14	5.80	26	13.3	14
15	2.87	15	3.87	4.11	41	14.8	5.83	20	9.73	15
16	2.82	17	4.16	4.08	35 S	12.8	5.43	15	7.51	16
17	3.22	31 S	8.62	3.95	36	12.3	5.43	16	8.43	17
18	3.38	31	9.05	4.07	38	13.4	5.89	21	10.3	18
19	3.84	32	10.1	4.24	37	13.8	5.89	30	15.3	19
20	4.13	32	11.4	4.32	36	13.4	5.99	28	14.5	20
21	4.81	86	23.8	4.26	29	10.7	5.91	27	13.8	21
22	5.81	79	39.7	4.29	28 S	10.4	5.85 E	34	17.2	22
23	4.83	45	18.8	4.55	33	13.0	5.85 E	26	13.1	23
24	4.08	33 S	11.5	5.11	42	18.5	7.04	28 S	17.0	24
25	3.76	32	10.4	7.24	88	55.0	9.44	38	31.0	25
26	3.62	30	9.12	7.85	63	41.8	10.0 E	35	30.2	26
27	3.43	24	7.11	6.88	48	27.3	9.40 E	23	18.7	27
28	3.87	44	14.7	6.92	81	82.4	8.83	21	16.0	28
29	4.81	48 S	16.7	6.21	47	33.3	10.5	34	30.6	29
30	4.87	52	21.8	5.81	34	20.0	16.8	194 S	315	30
31				5.12	31	16.4				31
TOTAL	106.02		294.12	156.94		592.78	218.80		850.37	TOTAL

DAY	DEC DAILY DISCHARGE (m^3/s)	DEC MEAN CONCENTRATION (mg/L)	DEC DAILY LOAD (t)	DAILY DISCHARGE (m^3/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m^3/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	20.8	184	327							1
2	17.8	78	118							2
3	14.2	57	69.9							3
4	11.8	48	47.3							4
5	10.7	31	28.7							5
6	9.12	22	17.3							6
7	7.54	22	14.3							7
8	7.89	22	15.1							8
9	10.5	47	42.6							9
10	26.8	248	578							10
11	24.8	128	275							11
12	17.5	71	107							12
13	15.3	52	68.7							13
14	13.3	44	50.8							14
15	11.8	35	35.7							15
16	10.6 E	32	29.9							16
17	10.2 E	28	24.8							17
18	9.60 E	23	19.5							18
19	9.75 E	18	15.2							19
20	9.70 E	30	25.1							20
21	15.1	59	77.0							21
22	15.9	59	81.1							22
23	14.1	40	48.7							23
24	12.3	30	31.9							24
25	14.1	87	108							25
26	22.0	118	226							26
27	15.0 E	82	80.4							27
28	12.0 E	47	48.7							28
29	10.3 E	44	39.2							29
30	9.10 E	42	33.0							30
31	8.40 E	32	23.2							31
TOTAL	418.48		2 704.0							TOTAL

E - ICE CONDITIONS

S - SAMPLE(S) COLLECTED THIS DAY

NOTTAWASAGA RIVER NEAR BAXTER - STATION NO. 02ED003

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JAN 14	13:15	0.1	7.82	15.0	DH59	11															
MAR 08	16:45	2.0	37.0	15.0	DH59	3510 C	367														
MAR 17	11:00	0.3	16.2	15.0	DH59	116															
MAR 17	13:40	0.5	13.7	15.0	DH59	92															
MAR 23	18:45	1.0	33.9	15.0	DH59	348															
MAR 25	16:30	2.0	33.8	15.0	DH59	274															
MAR 27	16:30	1.5	38.5	15.0	DH59	272	331														
MAR 28	15:00	2.0	26.3	15.0	DH59	186															
MAR 29	13:50	3.5	21.0	15.0	DH59	127															
APR 09	13:30	7.0	41.1	15.0	DH59	192	389														
APR 12	14:00	7.0	17.5	15.0	DH59	76															
APR 14	17:00	7.5	16.6	15.0	DH59	81	370														
APR 16	16:45	7.5	19.3	15.0	DH59	63															
APR 18	11:00	7.5	15.0	15.0	DH59	33															
APR 20	08:45	10.0	12.7	15.0	DH59	27															
MAY 05	13:15	9.0	7.04	15.0	DH59	18															
MAY 11	16:45	13.0	5.20	15.0	DH59	10															
MAY 13	16:45	13.0	5.19	15.0	DH59	8															
MAY 20	17:00	12.0	5.01	15.0	DH59	10	434														
MAY 25	17:00	11.0	5.89	15.0	DH59	15															
MAY 28	11:15	10.0	5.77	15.0	DH59	42															
JUN 05	17:00	15.0	5.75	15.0	DH59	32															
JUN 08	17:00	16.0	7.58	15.0	DH59	42	387														
JUN 09	12:10	15.0	5.11	15.0	DH59	34															
JUN 15	15:35	18.0	5.87	15.0	DH59	46	387														
JUN 25	15:30	20.0	4.61	15.0	DH59	43															
JUL 02	17:15	17.0	4.59	15.0	DH59	60															
JUL 12	20:00	24.0	5.11	15.0	DH59	72															
JUL 25	17:20	22.0	3.58	15.0	DH59	15															
JUL 29	13:00	23.0	2.77	15.0	DH59	20															
AUG 03	18:00	20.0	5.56	15.0	DH59	46	394														
AUG 13	15:30	15.0	3.71	15.0	DH59	23															
SEP 10	11:30	13.5	3.01	15.0	DH59	20															
SEP 11	09:30	14.0	2.66	15.0	DH59	20															
SEP 14	12:15	13.0	3.02	15.0	DH59	25															
SEP 17	11:20	13.0	3.63	15.0	DH59	37															
SEP 24	12:15	10.5	4.04	15.0	DH59	34															
SEP 29	10:30	12.0	4.43	15.0	DH59	46															
OCT 03	10:05	8.0	4.53	15.0	DH59	44															
OCT 08	14:45	9.5	3.94	15.0	DH59	24	348														
OCT 10	10:20	3.5	4.94	15.0	DH59	39															
OCT 13	12:30	8.0	4.23	15.0	DH59	16															
OCT 16	14:25	7.5	4.06	15.0	DH59	37															
OCT 22	12:30	4.0	4.23	15.0	DH59	28															
NOV 03	15:50	5.0	5.63	15.0	DH59	27															
NOV 10	15:20	0.1	8.79	15.0	DH59	38	405														
NOV 24	11:10	1.0	7.27	15.0	DH59	30															
NOV 30	14:00	2.0	18.8	15.0	DH59	215	380														

NOTE : SINGLE VERTICAL LOCATED AT 15 METRES FOR 1987

CONCENTRATION SYMBOL(S): C - COARSE MATERIAL PRESENT

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : JAN-DEC MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1980	---------P---	MANUAL	32	SEP 10	32	SEP 10	---	---	---	---	---	---
1983	CCCCCCCCCCCC	MANUAL	583	APR 04	2	OCT 18	1 910	MAR 20	27 100	74.3	74.3	---
1984	CCCCCCCCCCCC	MANUAL	688	FEB 18	5	OCT 10	3 820	FEB 17	49 400	135	105	28.8
1985	CCCCCCCCCCCC	MANUAL	1 480	APR 19	1	OCT 30 *	10 500	MAR 29	89 700	191	133	25.3
1986	--CCCCCCCCC-	MANUAL	583	SEP 23	3	NOV 11	3 830	MAR 19	42 300	---	---	---
1987	P-CCCCCCCCCC	MANUAL	3 510	MAR 8 *	5	MAY 13	14 900	APR 06 *	72 500 *	---	---	---

MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

PARKHILL CREEK ABOVE PARKHILL RESERVOIR - STATION NO. 02FF003

LOCATION: LAT 43 09 49 N LONG 081 37 54 W
DRAINAGE AREA: 110 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 18	09:40	1.0	0.696	5.0	X DH48	25	330														
APR 13	08:30	8.0	5.45	10.0	DH59	163	281														
MAY 27	07:30	17.0	0.053	5.0	X DH48	17	410														
AUG 14	12:00	24.0	0.010	5.0	X DH48	52	348														
OCT 19	09:30		0.037	5.0	X DH48	17	585														
NOV 05	10:45		0.386	5.0	X DH48	31	542														
DEC 14	09:30		2.28	5.0	X DH48	19	450														

NOTE : SINGLE VERTICAL LOCATED AT 10 METRES FOR 1987

VERTICAL SYMBOL(S): X - NOT AT REGULAR SINGLE SAMPLE VERTICAL

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)				MINIMUM (mg/L)				SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	---PPPP-PP--	MANUAL	273	JUL 3	*		37	OCT 28			---	---	---	---	---	---
1986	--PPPPPP-PP-	MANUAL	263	MAR 13			8	NOV 24	*		---	---	---	---	---	---
1987	--PPP--P-PPP	MANUAL	163	APR 13			17	MAY 27			---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

PIC RIVER NEAR MARATHON - STATION NO. 02BB003

LOCATION: LAT 48 46 26 N LONG 086 17 49 W
DRAINAGE AREA: 4 270 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 23	15:45	4.0	107	33.0	D49	180	132														
JUN 18	11:00		22.0	33.0	D49	20	236														

NOTE : SINGLE VERTICAL LOCATED AT 33 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)				MINIMUM (mg/L)				SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	---P--P--P--	MANUAL	2 810	APR 25	*		42	OCT 23			---	---	---	---	---	---
1986	---P--------	MANUAL	870	APR 25			444	APR 25			---	---	---	---	---	---
1987	---P-P------	MANUAL	180	APR 23			20	JUN 18	*		---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

PINE RIVER AT LUNSAR - STATION NO. 02FD001

LOCATION: LAT 44 05 40 N LONG 081 43 31 W
DRAINAGE AREA: 154 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED IN 1986

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 16	16:15	2.0	2.04	6.0	DH48	65	328														
APR 06	12:10	5.0	7.88	6.0	DH59	196	330														
APR 15	12:40		1.53	6.0	DH48	57	285														
MAY 26	07:30	11.0	0.078	6.0	DH48	22	343														
NOV 03	15:35	6.0	1.73	6.0	DH48	18	321														

NOTE : SINGLE VERTICAL LOCATED AT 6 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)			MINIMUM (mg/L)			SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1986	--PPPPP--P--	MANUAL	430	MAR 16	*	22	MAY 13		---	---	---	---	---	---
1987	--PPP-----P-	MANUAL	196	APR 6		18	NOV 3	*	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

REDHILL CREEK AT HAMILTON - STATION NO. 02HA014

LOCATION: LAT 43 13 56 N LONG 079 47 06 W
DRAINAGE AREA: 80.8 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
FEB 19	12:00	0.1	0.152	4.0	DH48	48	1870														
MAR 09	12:20	1.0	1.81	4.0	DH48	43	758														
MAR 26	14:00	7.0	0.421	4.0	DH48	10	808														
APR 08	14:30	10.0	7.00	4.0	DH59	380 C	646														
APR 08	09:35	8.0	1.78	4.0	DH48	28	820														
MAY 28	08:30	18.0	0.090	4.0	DH48	8	1010														
JUN 10	13:00	21.0	0.080	4.0	DH48	4	880														
JUN 24	10:15		0.262	4.0	DH48	21	858														
JUL 21	08:10	25.0	0.401	4.0	DH48	51	672														
AUG 10	08:30	18.0	1.23	4.0	DH48	51	742														
AUG 27	11:15	15.0	0.410	4.0	DH48	48	845														
SEP 15	09:25	18.0	0.087	4.0	DH48	8	940														
OCT 20	14:00	9.0	0.082	4.0	DH48	2	955														
NOV 03	10:40	8.0	0.095	4.0	DH48	4	1070														
DEC 08	10:40	5.0	1.38	4.0	DH48	245	785														

NOTE : SINGLE VERTICAL LOCATED AT 4 METRES FOR 1987

CONCENTRATION SYMBOL(S): C - COARSE MATERIAL PRESENT

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)			MINIMUM (mg/L)			SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1985	-PP-P--PP-PP	MANUAL	2 740	MAR 28	*	0	AUG 14	*	---	---	---	---	---	---
1986	--PPP-P----P	MANUAL	243	MAR 11		10	MAY 7		---	---	---	---	---	---
1987	-PPPPPPPPPPP	MANUAL	380	APR 6		2	OCT 20		---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

RUSCOM RIVER NEAR RUSCOM STATION - STATION NO. 02GH002

LOCATION: LAT 42 13 54 N LONG 082 37 00 W
DRAINAGE AREA: 125 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MAR 1986

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 16	14:00	1.0	0.376	3.1	DH48	20	523														
APR 08	07:40	7.0	1.65	3.1	DH48	111	570														
MAY 21	09:00	16.5	0.095	3.1	DH48	127	648														
JUL 16	08:30	21.0	0.110	3.1	DH48	100	590														
SEP 17	08:30	17.0	1.38	3.1	DH48	97	541														
OCT 21	10:50	6.0	0.065	3.1	DH48	37	582														
NOV 04	10:55	10.0	0.575	3.1	DH48	37	610														
DEC 15	11:00		9.52	3.1	DH59	3520	378	64	90	99	100								0	10	90

NOTE : SINGLE VERTICAL LOCATED AT 3.1 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1986	--PPP-P--P--	MANUAL	422 MAR 11		38 OCT 21		---	---	---	---	---	---
1987	--PPP-P-PPPP	MANUAL	3 520 DEC 15	*	20 MAR 16	*	---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

ONTARIO

SOUTH MAITLAND RIVER AT SUMMERHILL - STATION NO. 02FE009

SUSPENDED SEDIMENT FOR 1987

LOCATION: LAT 43 41 04 N LONG 81 32 38 W
DRAINAGE AREA: 376 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

TOTAL SUSPENDED SEDIMENT LOAD 3 220 TONNES FOR THE PERIOD MAR 01 TO MAY 31

REMARKS:

	MAR			APR			MAY			
DAY	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAILY DISCHARGE (m³/s)	MEAN CONCENTRATION (mg/L)	DAILY LOAD (t)	DAY
1	2.01 B	10	1.74	15.6	38	51.2	1.78	22	4.07	1
2	7.30 B	15	8.48	12.0	28	29.0	1.43	18	2.32	2
3	12.8 B	25	27.2	10.7	27 S	25.0	1.23	18	1.91	3
4	13.1 B	28	31.7	11.1	25	33.6	1.09	15	1.51	4
5	13.3 B	32	36.8	10.9	57	88.0	1.02	33	2.03	5
6	10.8 B	28	25.8	27.6	27 S	84.8	1.07	25	2.31	6
7	12.8 B	62	68.8	22.0	14	25.6	1.04	18	1.82	7
8	26.6 B	95	245	13.6	12	14.0	0.952	14	1.15	8
9	35.2 B	63	192	7.82	13	8.90	0.902	12	0.94	9
10	37.3 B	49	158	6.12	11	5.82	0.849	10	0.73	10
11	31.0 B	45	121	5.33	7	3.23	0.812	12	0.84	11
12	18.7 B	42	67.8	5.38	32	14.8	0.788	11	0.73	12
13	9.40 B	35	31.7	8.75	71	58.8	0.708	8	0.49	13
14	8.04 B	30	18.7	8.41	49	35.6	0.885	10	0.88	14
15	5.12 B	23	10.2	8.82	25 S	14.7	0.778	23	1.55	15
16	5.18 B	18 S	8.80	5.83	21	10.2	0.748	17	1.10	16
17	6.03	26	13.8	4.82	21	8.38	0.825	12	0.85	17
18	8.21	36	25.5	3.84	21	6.97	0.831	25	1.42	18
19	13.9	55 S	61.7	3.11	23	6.18	0.744	40	2.57	19
20	20.1	170	311	2.66	23	5.27	0.697	29	1.75	20
21	28.0	138	306	2.40	20	4.15	0.852	25	1.48	21
22	30.2	83	217	2.17	18	3.00	0.801	24	1.25	22
23	33.3	57	164	2.03	16	2.48	0.888	20	0.96	23
24	32.6	34 S	88.4	1.83	12	2.00	0.818	16	0.72	24
25	27.8	23	55.2	1.62	11	1.55	0.806	16	0.70	25
26	23.7	18	37.3	1.48	11	1.41	0.492	14 S	0.60	26
27	16.4	16	22.7	1.48	22	2.81	0.484	14	0.59	27
28	11.4	13	12.8	2.09	42	7.58	0.448	15	0.58	28
29	8.48	14	10.2	1.70	25	3.87	0.407	13	0.48	29
30	12.8	77	85.2	1.48	27	3.45	0.383	13	0.43	30
31	19.8	73	124				0.489	25	1.52	31
TOTAL	538.34		2 623.80	220.84		554.22	34.072		40.28	TOTAL

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
JAN 07	12:45	0.1	3.49	28.0	DH59	48															
MAR 18	12:10	2.0	5.01	28.0	DH59	18	471														
MAR 19	13:00		13.4	28.0	DH59	83															
MAR 26	10:30		31.8	28.0	DH59	36															
APR 03	17:00		10.5	28.0	DH59	37															
APR 06	10:00		27.6	28.0	DH59	21	388														
APR 15	11:00		5.83	28.0	DH59	26															
MAY 26	12:15	16.0	0.814	28.0	DH59	15	269														
JUN 10	10:45		0.361	28.0	DH59	31															
JUN 22	13:10		0.488	28.0	DH59	27	380														
JUL 27	14:30	26.0	0.575	28.0	DH59	18	373														
AUG 03	20:15		10.7	28.0	DH59	65	344														
SEP 01	20:30		0.301	28.0	DH59	21															
SEP 29	12:30	12.0	0.382	28.0	DH59	18															
NOV 03	15:10		3.66	28.0	DH59	8	326														
NOV 10	10:30		16.2	28.0	DH59	30															
NOV 27	10:30		47.2	28.0	DH59	42	248														

NOTE : SINGLE VERTICAL LOCATED AT 28 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)			MINIMUM (mg/L)			SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)			TOTAL FOR PERIOD (TONNES)	SUMMARY : APR-DEC MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1984	--PCCCCCCCCC	MANUAL	178	DEC	30	2	AUG	8 *	2 310	DEC	28	7 310	28.5	28.5	---
1985	CCCCCCCCCCCC	MANUAL	345	APR	5 *	3	AUG	14	2 380	APR	05	31 700	38.2	31.4	18.4
1986	CCCCCCCCCCCC	MANUAL	310	MAR	19	7	JAN	10	2 870	SEP	11 *	28 600 *	89.5	44.1	29.5
1987	P-CCCPPPP-P-	MANUAL	85	AUG	3	9	NOV	3	311	MAR	20	3 220	---	---	---

MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

SOUTH NATION RIVER NEAR PLANTAGENET SPRINGS - STATION NO. 02LB005

SUSPENDED SEDIMENT FOR 1987

LOCATION: LAT 45 30 23 N LONG 74 57 20 W
DRAINAGE AREA: 3 810 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

TOTAL SUSPENDED SEDIMENT LOAD 119 000 TONNES FOR THE PERIOD MAR 30 TO JUN 09

REMARKS:SEASONAL STATION 1985. MISC.OPERATION JAN 1988

DAY	MAR DAILY DISCHARGE (m³/s)		MAR MEAN CONCENTRATION (mg/L)		MAR DAILY LOAD (t)	APR DAILY DISCHARGE (m³/s)		APR MEAN CONCENTRATION (mg/L)		APR DAILY LOAD (t)	MAY DAILY DISCHARGE (m³/s)		MAY MEAN CONCENTRATION (mg/L)		MAY DAILY LOAD (t)	DAY
1	4.48	B				405		89	S	2 830	23.5		338	S	483	1
2	4.70	B				283		81	S	1 980	21.5		326		430	2
3	4.80	B				183	A	88	S	1 040	18.9		187		305	3
4	4.94	B				142	A	82	S	781	15.7		147		199	4
5	4.44	B				305		99	S	2 610	13.2		134		153	5
6	4.88	B				341		111	S	3 270	12.1		135		141	6
7	5.08	B				288		74	S	1 710	11.2		145	S	142	7
8	5.30	B				194		114	S	1 910	10.8		133		124	8
9	5.05	B				161		89	S	1 210	10.4		122		110	9
10	15.2	B				102		94	S	826	8.37		97		70.1	10
11	25.2	B				75.8		56	S	380	8.02		72		49.9	11
12	35.1	B				66.8		72		353	8.75		39	S	33.8	12
13	38.0	B				62.3		104		380	10.3		49		35.8	13
14	34.1	B				31.9		132	S	384	8.37		44		35.8	14
15	31.0	B				28.4		136	S	334	10.1		47		41.0	15
16	27.8	B				26.7		73	S	168	16.2		62		78.1	16
17	25.5	B				24.6		81	S	171	15.3		68		88.9	17
18	24.2	B				22.9		111		220	14.1		68		70.7	18
19	23.6	B				20.7		130		233	12.6		45		49.8	19
20	28.5	B	66		126	18.9		153	S	250	11.5		35		34.8	20
21	31.8	B	80		184	18.1		123		171	10.0		31		26.8	21
22	54.0	B	91		425	14.8		59	S	75.4	8.38		49		28.0	22
23	157		151		2 180	13.4		45		55.7	10.4		43		36.9	23
24	285		223		5 880	14.5		86	S	108	17.2		52		77.3	24
25	303	B	341	S	10 700	18.9		108		155	16.8		88		80.3	25
26	462	B	449	S	17 900	18.4		88		139	13.7		66		68.7	26
27	855	B	405	S	23 300	15.2		95		125	11.2		55		43.3	27
28	704	B	218		15 000	13.9		92	S	110	12.3		84		87.4	28
29	700	B	128		7 820	15.4		120		160	18.7		97		108	29
30	592		80	S	4 000	18.9		158		258	20.8		80		144	30
31	458		78	S	3 380						28.7		105		249	31
TOTAL	4 966.88				91 057	2 572.4				22 360.1	427.23				3 676.7	TOTAL

DAY	JUN DAILY DISCHARGE (m³/s)		JUN MEAN CONCENTRATION (mg/L)		JUN DAILY LOAD (t)	DAY
1	22.8		82		162	1
2	17.6		71		108	2
3	15.8		88		147	3
4	19.9		89		153	4
5	15.6		55		75.6	5
6	18.0		33		45.8	6
7	13.4		30		34.7	7
8	18.4		33		50.9	8
9	61.6		150	S	788	9
10	75.5					10
11	49.2					11
12	30.1					12
13	27.3					13
14	25.3					14
15	20.8					15
16	14.7					16
17	13.3					17
18	11.4					18
19	9.18					19
20	8.81					20
21	9.22					21
22	8.60					22
23	8.35					23
24	8.08					24
25	8.05					25
26	8.18					26
27	8.66					27
28	10.7					28
29	11.8					29
30	14.0					30
31						31
TOTAL	583.13				1 809.0	TOTAL

A - MANUAL GAUGE B - ICE CONDITIONS S - SAMPLE(S) COLLECTED THIS DAY

SOUTH NATION RIVER NEAR PLANTAGENET SPRINGS - STATION NO. 02LB005

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)		SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 25	15:45	2.0	383	W	20.4	DH48	402															
MAR 25	17:00	2.0	382	W	20.4	DH48	341															
MAR 25	15:50	1.0	482	W	20.4	DH48	418	191														
MAR 26	17:20	1.0	492	W	20.4	DH48	480															
MAR 27	08:45	1.0	610		20.4	DH48	359															
MAR 30	12:50	0.1	592		20.4	DH48	88	322														
MAR 30	14:10	0.1	596		20.4	DH48	117	228														
MAR 31	17:00	0.1	315		20.4	DH48	78															
APR 01	16:30	0.1	301		20.4	DH48	61															
APR 02	16:00	0.1	255		20.4	DH48	61															
APR 03	16:00	1.0	190		20.4	DH48	82	334														
APR 04	13:00	1.0	276		20.4	DH48	83															
APR 05	14:10	1.0	251		20.4	DH48	108															
APR 06	16:00	1.0	283		20.4	DH48	95															
APR 07	16:30	0.1	307		20.4	DH48	84															
APR 08	16:30	1.0	212		20.4	DH48	147	370														
APR 09	16:00	2.0	138		20.4	DH48	72															
APR 10	17:00	2.0	152		20.4	DH48	110															
APR 11	09:45	3.0	144		20.4	DH48	47															
APR 14	16:15	8.0	93.0		20.4	DH48	140															
APR 15	16:00	5.0	89.2		20.4	DH48	129															
APR 16	17:50	7.0	95.1		20.4	DH48	58	388														
APR 17	13:30	8.0	78.2		20.4	DH48	87															
APR 20	15:00	11.0	44.0		20.4	DH48	184															
APR 22	11:10	10.0	16.6		20.4	DH48	45	387														
APR 22	13:20	10.0	14.1		20.4	DH48	51															
APR 24	15:00	9.0	15.6		20.4	DH48	139	355														
APR 28	17:45	8.0	16.2		20.4	DH48	90															
MAY 01	16:00	10.0	14.2		20.4	DH48	248															
MAY 07	15:15	12.0	13.1		20.4	DH48	148															
MAY 12	15:00	15.0	10.5		20.4	DH48	35															
JUN 09	10:40	20.5	61.2		20.4	DH48	158	304														

NOTE : SINGLE VERTICAL LOCATED AT 20.4 METRES FOR 1987

DISCHARGE SYMBOL(S): W - DAILY MEAN; ICE CONDITIONS

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		TOTAL FOR PERIOD (TONNES)	SUMMARY : MAR-AUG MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1972	CCCCCCCCCCCC	DUAL	986	APR 13	14	MAY 17	38 000	APR 18	515 000	2 030	2 030	---
1973	CCCCCCCCCCCC	DUAL	887	MAY 19	16	JAN 02	23 800	MAY 19	309 000	1 500	1 770	15.0
1974	CCCCCCCCCCCC	DUAL	612	APR 06	15	JAN 11	35 600	APR 06	293 000	1 510	1 880	10.4
1975	CCCCCCCPPPP	DUAL	295	APR 15	4	MAR 25 *	9 260	APR 20	83 500	437	1 370	26.4
1976	CCCCCCC----	MANUAL	5 880	MAY 21 *	11	MAR 08	157 000	MAY 20 *	538 000 *	2 910	1 880	24.0
1977	P-CCCCCP-CCC	MANUAL	147	MAR 17	18	DEC 19	8 640	MAR 17	98 200	---	---	---
1978	CCCCPPPPPPP-	MANUAL	435	APR 13	18	FEB 15	31 400	APR 14	210 000	---	---	---
1979	P-CCCCCCCCCC	MANUAL	425	MAR 24	19	JAN 04	20 700	MAR 25	192 000	784	1 530	23.5
1980	--CCCCPPP--	MANUAL	829	APR 10	22	MAR 13	26 800	APR 10	153 000	---	---	---
1981	-PCCCCCPPPP	MANUAL	842	JUN 23	12	MAR 21	47 700	FEB 22	248 000	384	1 370	25.2
1982	CCCCCCCCCCC	MANUAL	854	APR 01	12	JAN 12	31 800	APR 01	225 000	1 010	1 320	22.9
1983	CCCCCCCCCCC	MANUAL	87	APR 10	15	JAN 21	4 750	MAY 03	108 000	430	1 320	23.3
1984	P-CCCCPPP-PP	MANUAL	455	APR 6	10	MAR 15	23 100	APR 05	102 000	---	---	---
1985	--CCCP-P-PP-	MANUAL	415	MAR 14	24	NOV 21	8 880	MAR 15	143 000	---	---	---
1986	--PCCPP-----	MANUAL	306	MAY 21	23	MAR 25	5 330	MAR 30	43 800	---	---	---
1987	--PCCP------	MANUAL	480	MAR 26	35	MAY 12	23 300	MAR 27	119 000	---	---	---

DUAL - MANUAL AND AUTOMATIC SAMPLING MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

SPEED RIVER NEAR ARMSTRONG MILLS - STATION NO. 02GA040

LOCATION: LAT 43 38 19 N LONG 080 18 12 W
DRAINAGE AREA: 187 km^2
TYPE OF FLOW: REGULATED SINCE 1976
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM START MARCH 1988

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m^3/s)	SINGLE SAMPLING VERTICAL (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
APR 14	08:00	8.0	3.57	8.0	DH48	5	264														
MAY 29	15:00	21.0	0.579	8.0	DH48	7	358														
OCT 01	14:20	13.0	0.419	8.0	DH48	2	350														
OCT 28	15:15	8.0	1.15	8.0	DH48	5	424														
DEC 01	08:45	3.0	4.73	8.0	DH48	4	339														

NOTE : SINGLE VERTICAL LOCATED AT 8 METRES FOR 1987

SPEED RIVER NEAR ARMSTRONG MILLS - STATION NO. 02GA040

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1986	--P-----P---	MANUAL	135 MAR 18 *	9 MAR 27	--- ---	---	---	---	---
1987	---PP----P-P	MANUAL	7 MAY 29	2 OCT 1 *	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

SYDENHAM RIVER AT FLORENCE - STATION NO. 02SG003

LOCATION: LAT 42 38 00 N LONG 082 00 32 W
DRAINAGE AREA: 1 160 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 17	09:10	1.0	6.13	26.0	DH48	15	478														
APR 08	15:05		35.6	26.0	DH48	89	358														
APR 14	07:20	8.0	20.2	26.0	DH59	57	392														
MAY 22	09:25		2.83	26.0	DH48	113	435														
JUN 23	11:20	21.0	1.38	26.0	DH48	108	271														
JUL 13	11:10	24.0	0.881	26.0	DH48	84	351														
AUG 12	07:40	23.0	1.14	26.0	DH48	88	434														
SEP 15	14:20	18.0	0.810	26.0	DH48	48	392														
OCT 22	07:10	9.0	1.22	26.0	DH48	80	428														
NOV 02	14:00	10.0	3.10	26.0	DH48	48	528														
DEC 14	15:30		20.3	26.0	DH48	42	484														

NOTE : SINGLE VERTICAL LOCATED AT 26 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	HISTORICAL MEAN LOAD (TONNES)	STANDARD ERROR OF MEAN %
1986	-PCCCCP-PPP-	MANUAL	518 MAR 20 *	15 NOV 5	4 330 MAR 20 *	32 800 *	---	---	---
1987	--PPPPPPPPPP	MANUAL	113 MAY 22	15 MAR 17 *	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

SYDENHAM RIVER NEAR OWEN SOUND - STATION NO. 02FB007

LOCATION: LAT 44 31 21 N LONG 080 55 51 W
DRAINAGE AREA: 181 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MAR 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 17	09:00	0.5	2.98	10.0	DH48	8	268														
APR 07	08:15	2.0	10.6	10.0	DH59	8	270														
MAY 05	08:15	9.0	1.84	10.0	DH48	10	288														
MAY 25	10:50	10.0	1.01	10.0	DH48	10	283														
JUN 09	08:45	15.0	1.01	10.0	DH48	20	312														
JUL 28	07:30	21.0	0.741	10.0	DH48	21	356														
SEP 10	07:40	15.0	0.642	10.0	DH48	23	398														
OCT 13	07:55	9.0	1.15	10.0	DH48	13	288														
NOV 30	08:40	2.0	8.98	10.0	DH48	9	269														

NOTE : SINGLE VERTICAL LOCATED AT 10 METRES FOR 1987

SYDENHAM RIVER NEAR OWEN SOUND - STATION NO. 02FB007

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	SUMMARY : HISTORICAL MEAN LOAD (TONNES)	SUMMARY : HISTORICAL STANDARD ERROR OF MEAN %
1987	--PPPPP-PPP-	MANUAL	23 SEP 10 *	8 MAR 17 *	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

THAMES RIVER AT INNERKIP - STATION NO. 02GD021

LOCATION: LAT 43 12 55 N LONG 080 41 24 W
DRAINAGE AREA: 148 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 28	09:40	4.0	6.59	12.0	DH48	33	371														
APR 05	09:10	4.0	20.8	12.0	DH59	107	289														
APR 08	08:10	5.0	4.99	12.0	DH48	8	407														
APR 28	14:10	9.0	0.558	12.0	DH48	20	333														
MAY 05	07:50	9.0	0.286	12.0	DH48	8	417														
JUN 04	08:30		0.841	12.0	DH48	10	554														
JUL 21	08:10	24.0	0.120	12.0	DH48	14	423														
AUG 12	13:10	21.0	0.138	12.0	DH48	5	510														
SEP 08	08:35	15.0	0.088	12.0	DH48	6	498														
OCT 05	12:10	10.0	0.180	12.0	DH48	11	488														
NOV 17	10:10	8.0	0.303	12.0	DH48	12	400														
DEC 14	13:15	4.0	1.80	12.0	DH48	12	478														

NOTE : SINGLE VERTICAL LOCATED AT 12.0 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)	SAMPLED CONCENTRATION MINIMUM (mg/L)	SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	SUMMARY : HISTORICAL MEAN LOAD (TONNES)	SUMMARY : HISTORICAL STANDARD ERROR OF MEAN %
1984	-P---P--CCCC	DUAL	1 710 FEB 16 *	8 SEP 13	7 810 FEB 14 *	20 200 *	---	---	---
1985	CCCCCCCCCCCC	DUAL	1 020 APR 5	0 DEC 9 *	2 070 APR 05	10 300	28.3	28.3	---
1986	--PPP---P---	MANUAL	308 MAR 18	7 MAY 30	--- ---	---	---	---	---
1987	--PPPPPPPPPP	MANUAL	107 APR 5	5 AUG 12	--- ---	---	---	---	---

DUAL - MANUAL AND AUTOMATIC SAMPLING MANUAL - MANUAL SAMPLING

C - COMPLETE MONTH P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

TRENT RIVER AT GLENN ROSS - STATION NO. 02HK004

LOCATION: LAT 44 15 50 N LONG 077 38 10 W
DRAINAGE AREA: 1 200 km²
TYPE OF FLOW: REGULATED
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MAR 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAR 09	15:15	0.1	178 W	75.0	DH59	10	313														
MAR 26	13:50	0.5	255	75.0	DH59	4	391														
APR 03	10:05	2.0	398	75.0	DH59	7	382														
APR 08	09:50	3.0	584	75.0	DH59	18	228														
MAY 14	08:10	10.0	38.2	75.0	DH48	3	168														
JUN 18	11:30	24.0	32.8	75.0	DH48	7	219														
JUL 15	10:55		53.2	75.0	DH48	8	230														
AUG 14	07:40		30.0	75.0	DH48	9	224														
SEP 17	07:55		41.0	75.0	DH48	8	241														
SEP 29	10:00	15.0	27.6	75.0	DH48	5	181														
OCT 19	14:20	13.0	31.0	75.0	DH48	3	187														
NOV 16	15:15		83.6	75.0	DH48	7	170														
DEC 14	15:20		223	75.0	DH59	2	227														

NOTE : SINGLE VERTICAL LOCATED AT 75 METRES FOR 1987

DISCHARGE SYMBOL(S): W - DAILY MEAN; ICE CONDITIONS

TRENT RIVER AT GLENN ROSS - STATION NO. 02HK004

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM		SAMPLED CONCENTRATION MINIMUM		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD	SUMMARY : MEAN LOAD	SUMMARY : HISTORICAL MEAN LOAD	SUMMARY : STANDARD ERROR OF MEAN %
	(JFMAMJJASOND)		(mg/L)		(mg/L)		(TONNES)	(TONNES)	(TONNES)	(TONNES)	
1987	--PPPPPPPPPP	MANUAL	15	APR 8 *	2	DEC 14 *	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

TWENTY MILE CREEK AT BALLS FALLS - STATION NO. 02HA008

LOCATION: LAT 43 08 02 N LONG 079 23 00 W
DRAINAGE AREA: 293 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

REMARKS: PROGRAM STARTED MAR 1987

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAY 25	11:30	17.0	0.055	12.0	DH48	4	983														
JUL 06	11:30	23.0	0.378	12.0	DH48	8	437														
AUG 31	11:30	19.0	0.139	12.0	DH48	15	486														
OCT 06	10:45	12.0	0.209	12.0	DH48	9	471														

NOTE : SINGLE VERTICAL LOCATED AT 5.0 METRES FOR 1987

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM		SAMPLED CONCENTRATION MINIMUM		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY	SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD	SUMMARY : MEAN LOAD	SUMMARY : HISTORICAL MEAN LOAD	SUMMARY : STANDARD ERROR OF MEAN %
	(JFMAMJJASOND)		(mg/L)		(mg/L)		(TONNES)	(TONNES)	(TONNES)	(TONNES)	
1987	----P-PP-P--	MANUAL	15	AUG 31 *	4	MAY 25 *	--- ---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH * - EXTREME FOR PERIOD OF RECORD

WINISK RIVER BELOW ASHEWEIG RIVER TRIBUTARY - STATION NO. 04DC001

LOCATION: LAT 54 31 00 N LONG 087 14 00 W
DRAINAGE AREA: 50 000 km²
TYPE OF FLOW: NATURAL
TYPE OF GAUGE: RECORDING

INSTANTANEOUS SUSPENDED SEDIMENT FOR 1987

DATE	TIME	WATER TEMP. (°C)	INSTANT. DISCHARGE (m³/s)	SINGLE VERTICAL SAMPLING (m)	TYPE OF SAMPLER	INSTANT. CONCENT. (mg/L)	DISSOLVED SOLIDS (mg/L)	PERCENT FINER THAN INDICATED SIZE, IN MILLIMETRES .002	.004	.008	.016	.031	.062	.125	.250	.500	1.00	2.00	PERCENT SAND	SILT	CLAY
MAY 12	14:30	6.0	539	MID	D49	17	137														
JUL 14	11:50		356	MID	D49	18	168														

NOTE : SINGLE VERTICAL LOCATED AT MID (MID STREAM) FOR 1987

ONTARIO

WINISK RIVER BELOW ASHEWEIG RIVER TRIBUTARY - STATION NO. 04DC001

HISTORICAL SEDIMENT DATA SUMMARY

YEAR	PERIOD OF OPERATION SUMMARY (JFMAMJJASOND)	TYPE OF SAMPLING	SAMPLED CONCENTRATION MAXIMUM (mg/L)		SAMPLED CONCENTRATION MINIMUM (mg/L)		SUSPENDED SEDIMENT LOAD MAXIMUM DAILY (TONNES)		SUSPENDED SEDIMENT LOAD TOTAL FOR PERIOD (TONNES)	SUMMARY : MEAN LOAD (TONNES)	SUMMARY : HISTORICAL MEAN LOAD (TONNES)	SUMMARY : STANDARD ERROR OF MEAN %
1978	-----P------	MANUAL	48 JUN 02	*	48 JUN 02		---	---	---	---	---	---
1979	---------P---	MANUAL	12 SEP 28		12 SEP 28		---	---	---	---	---	---
1980	----P-P-----	MANUAL	26 JUL 07		15 MAY 05		---	---	---	---	---	---
1984	----P---P---	MANUAL	7 MAY 31		5 SEP 2	*	---	---	---	---	---	---
1985	------P-P---	MANUAL	9 JUL 11		7 SEP 30		---	---	---	---	---	---
1987	----P-P-----	MANUAL	18 JUL 14		17 MAY 12		---	---	---	---	---	---

MANUAL - MANUAL SAMPLING

P - PARTIAL MONTH

* - EXTREME FOR PERIOD OF RECORD

STA. NO.	NAME	PAGE
02AE001	GRAVEL RIVER NEAR CAVERS	24
02BA003	LITTLE PIC RIVER NEAR COLDWELL	31
02BB002	BLACK RIVER NEAR MARATHON	12
02BB003	PIC RIVER NEAR MARATHON	38
02BF002	GOULAIS RIVER NEAR SEARCHMONT	24
02CC006	MISSISSAGI RIVER AT MISSISSAGI CHUTE	35
02ED003	NOTTAWASAGA RIVER NEAR BAXTER	38
02ED005	MAD RIVER NEAR GLENCAIRN	32
02FB007	SYDENHAM RIVER NEAR OWEN SOUND	46
02FB008	BEAVER RIVER NEAR CLARKSBURG	7
02FB010	BIGHEAD RIVER NEAR MEAFORD	12
02FD001	PINE RIVER AT LURGAN	40
02FE008	SOUTH MAITLAND RIVER AT SUMMERHILL	42
02FF002	AUSABLE RIVER NEAR SPRINGBANK	3
02FF007	BAYFIELD RIVER NEAR VARNA	6
02FF008	PARKHILL CREEK ABOVE PARKHILL RESERVOIR	39
02GA010	NITH RIVER NEAR CANNING	35
02GA039	CONESTOGO RIVER ABOVE DRAYTON	13
02GA040	SPEED RIVER NEAR ARMSTRONG MILLS	44
02GB007	FAIRCHILD CREEK NEAR BRANTFORD	23
02GC002	KETTLE CREEK AT ST. THOMAS	30
02GC007	BIG CREEK NEAR WALSINGHAM	6
02GC015	LITTLE OTTER CREEK NEAR STRAFFORDVILLE	30
02GC018	CATFISH CREEK NEAR SPARTA	13
02GC022	NANTICOKE CREEK AT NANTICOKE	34
02GC026	BIG OTTER CREEK NEAR CALTON	9
02GD015	NORTH THAMES RIVER NEAR THORNDALE	35
02GD021	THAMES RIVER AT INNERKIP	46
02GE007	MCGREGOR CREEK NEAR CHATHAM	33
02GG003	SYDENHAM RIVER AT FLORENCE	45
02GG009	BEAR CREEK BELOW BRIGDEN	7
02GM002	RUSCOM RIVER NEAR RUSCOM STATION	41
02HA006	TWENTY MILE CREEK AT BALLS FALLS	47
02HA014	REDHILL CREEK AT HAMILTON	40
02HB002	CREDIT RIVER AT ERINDALE	14
02HB012	GRINDSTONE CREEK NEAR ALDERSHOT	25
02HC013	HIGHLAND CREEK NEAR WEST HILL	28
02HC018	LYNDE CREEK NEAR WHITBY	32
02HC024	DON RIVER AT TODMORDEN	18
02HC025	HUMBER RIVER AT ELDER MILLS	26
02HC030	ETOBICOKE CREEK BELOW QUEEN ELIZABETH HIGHWAY	22
02HD012	GAHARASKA RIVER ABOVE DALE	23
02HK004	TRENT RIVER AT GLENN ROSS	48
02LA006	KEMPTVILLE CREEK NEAR KEMPTVILLE	28
02LB005	SOUTH NATION RIVER NEAR PLANTAGENET SPRINGS	43
02MB004	LYN CREEK NEAR LYN	31
04DC001	WINISK RIVER BELOW ASHEWEIG RIVER TRIBUTARY	47
04FC001	ATTAWAPISKAT RIVER BELOW MUKETEI RIVER	1
04HA001	ALBANY RIVER NEAR HAT ISLAND	1
04LG004	MOOSE RIVER ABOVE MOOSE RIVER	34
04ME003	ABITIBI RIVER AT ONAKAWANA	1

NAME	STA. NO.	PAGE
ABITIBI RIVER AT SMOKAWANA	04ME003	1
ALBANY RIVER NEAR HAT ISLAND	04HA001	1
ATTAWAPISKAT RIVER BELOW MUKETEI RIVER	04FC001	1
AUSABLE RIVER NEAR SPRINGBANK	02FF002	3
BAYFIELD RIVER NEAR VARNA	02FF007	6
BEAR CREEK BELOW BRIGDEN	02GE008	7
BEAVER RIVER NEAR CLARKESBURG	02FB009	7
BIG CREEK NEAR WALSINGHAM	02GC007	8
BIG OTTER CREEK NEAR CALTON	02GC028	9
BIGHEAD RIVER NEAR MEAFORD	02FB010	12
BLACK RIVER NEAR MARATHON	02BB002	12
CATFISH CREEK NEAR SPARTA	02GC018	13
CONESTOGO RIVER ABOVE DRAYTON	02GA038	13
CREDIT RIVER AT ERINDALE	02HB002	14
DON RIVER AT TODMORDEN	02HC024	18
ETOBICOKE CREEK BELOW QUEEN ELIZABETH HIGHWAY	02HC030	22
FAIRCHILD CREEK NEAR BRANTFORD	02GB007	23
GANARASKA RIVER ABOVE DALE	02HD012	23
GOULAIS RIVER NEAR SEARCHMONT	02BF002	24
GRAVEL RIVER NEAR CAVERS	02AE001	24
GRINDSTONE CREEK NEAR ALDERSHOT	02HB012	26
HIGHLAND CREEK NEAR WEST HILL	02HC013	25
HUMBER RIVER AT ELDER MILLS	02HC025	26
KEMPTVILLE CREEK NEAR KEMPTVILLE	02LA008	29
KETTLE CREEK AT ST. THOMAS	02GC002	30
LITTLE OTTER CREEK NEAR STRAFFORDVILLE	02GC018	30
LITTLE PIC RIVER NEAR COLDWELL	02BA003	31
LYN CREEK NEAR LYN	02MB008	31
LYNDE CREEK NEAR WHITBY	02HC018	32
MAD RIVER NEAR GLENCAIRN	02ED005	32
MCGREGOR CREEK NEAR CHATHAM	02GE007	33
MISSISSAGI RIVER AT MISSISSAGI CHUTE	02CC008	33
MOOSE RIVER ABOVE MOOSE RIVER	04LE004	34
NANTICOKE CREEK AT NANTICOKE	02GC022	34
NITH RIVER NEAR CANNING	02GA010	35
NORTH THAMES RIVER NEAR THORNDALE	02GD015	35
NOTTAWASAGA RIVER NEAR BAXTER	02ED003	36
PARKHILL CREEK ABOVE PARKHILL RESERVOIR	02FF006	39
PIC RIVER NEAR MARATHON	02BB003	39
PINE RIVER AT LURGAN	02FD001	40
REDHILL CREEK AT HAMILTON	02HA014	40
RUSCOM RIVER NEAR RUSCOM STATION	02GH002	41
SOUTH MAITLAND RIVER AT SUMMERHILL	02FE009	42
SOUTH NATION RIVER NEAR PLANTAGENET SPRINGS	02LB005	43
SPEED RIVER NEAR ARMSTRONG MILLS	02GA040	44
SYDENHAM RIVER AT FLORENCE	02GG003	45
SYDENHAM RIVER NEAR OWEN SOUND	02FB007	45
THAMES RIVER AT INNERKIP	02GD021	46
TRENT RIVER AT GLENN ROSS	02HK004	46
TWENTY MILE CREEK AT BALLS FALLS	02HA008	47
WINISK RIVER BELOW ASHEWEIG RIVER TRIBUTARY	04BC001	47